

June $14^{\text {th }}, 2018$

Melanie Bachman, Executive Director
ConnecticutSiting Council
10 FranklinSquare
New Britain, CT 06051

RE: Notice of Exempt Modification - Antenna Swap for wireless
facility located at 139 Morris Hubbard Rd, HIGGANUM,
CONNECTICUT - CT03XC161 (lat، $41^{\circ} 28^{\prime} 18.3^{\prime \prime}$ N, Iong. -
$\left.21^{\circ} 33^{\prime} 17.604^{\prime \prime} \mathrm{W}\right)$

Dear Ms. Bachman:

Sprint Spectrum, LP ("Sprint") currently maintains wireless telecommunications antennas at the (131-foot level) on an existing (150-foot monopole tower) at the above-referenced address. The property is owned by Joann M Baroni Foristall, and the tower are owned by American Tower Corporation.

Sprint's proposed work involves antenna replacement and tower work. Sprint intends to replace six (6) antennas and add twelve (12) RRHs onto the tower. All the proposed work is contained within the existing fenced area. Please refer to the attached drawings for site plans prepared by Infinigy Engineering.

Please accept this letter as notification pursuant to R.C.S.A. $\S 16-50 j-73$, for construction that constitutes an exempt modification pursuant to R.C.S.A. § 16-50j-72(b). In accordance with R.C.S.A. § 16-50j-73, a copy of this letter is being sent to LIZZ MILARDO, FIRST SELECTMAN, and LIZ GLIDDEN, TOWN PLANNER of the Town of Haddam. A copy of this letter is also being sent to JOANN M BARONI FORISTALL the owner of the property on which the tower is located, and JUSTINE PAUL the manager for AMERICAN TOWER CORPORATION who manages the site.

The planned modifications to the facility fall squarely within those activities explicitly provided for in R.C.S.A. $\S 16-50 \mathrm{j}$-72(b).

1. The proposed modifications will not result in an increase in the height of the existing tower.
2. The antennas work is a one-for-one replacement of facility components.

## AIROSMITH <br> DEVELOPMENT

We do it right the first time.
3. The proposed modifications will include the addition of ground base equipment as depicted on the attached drawings; however, the proposed equipment will not require an extension of the site boundaries.
4. The proposed modifications will not increase noise levels at the facility by six decibels or more.
5. The additional ground based equipment will not increase radio frequency (RF) emissions at the facility to a level at or above the Federal Communications Commission (FCC) adopted safety standard.

For the foregoing reasons, Sprint 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).

If you have any questions or require any additional information regarding this request, please do not hesitate to give me a call at (518) 350-4222 or email me to aperkowski@airosmithdevelopment.com

Kind Regards,


Arthur Perkowski
Airosmith Development inc.
32 Clinton Street
Saratoga Springs, NY 12866
518-306-1711 desk \& fax
518-871-3707 cell
aperkowski@airosmithdevelopment.com

Attachment

CC: LIZZ MILARDO (First Selectman / HADDAM, CT)
LIZ GLIDDEN (Town Planner / HADDAM, CT) JUSTINE PAUL (Manager / AMERICAN TOWER CORPORATION) JOANN M BARONI FORISTALL (Land Owner)

## 139 MORRIS HUBBARD RD

| Location | 139 MORRIS HUBBARD RD | Mblu | $34 / 014 / 3 / /$ |
| ---: | :--- | ---: | :--- |
| Acct\# | M0405600 | Owner | FORISTALL JOANN M BARONI |
| Assessment | $\$ 179,710$ | Appraisal | $\$ 256,730$ |
| PID 664 | Building Count | 1 |  |

## Current Value

| Appraisal |  |  |  |
| :---: | :---: | :---: | :---: |
| Valuation Year | Improvements | Land | Total |
| 2016 | \$163,640 | \$93,090 | \$256,730 |
| Assessment |  |  |  |
| Valuation Year | Improvements | Land | Total |
| 2016 | \$114,550 | \$65,160 | \$179,710 |

## Owner of Record

| Owner <br> Co-Owner | FORISTALL JOANN M BARONI | Sale Price <br> Certificate | $\$ 0$ |
| :--- | :--- | :--- | :--- |
| Address | 123 MORRIS HUBBARD RD | Book \& Page | $363 / 0110$ |
|  | HIGGANUM, CT 06441 | Sale Date | $07 / 31 / 2013$ |
|  |  | Instrument | 25 |

## Ownership History

| Ownership History |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Owner | Sale Price | Certificate | Book \& Page | Instrument | Sale Date |
| FORISTALL JOANN M BARONI | \$0 |  | 363/0110 | 25 | 07/31/2013 |
| BARONI HELEN (EST OF) | \$0 |  | 363/0109 | 25 | 07/31/2013 |
| BARONI HELEN S (EST OF) | \$0 |  | 357/684 | 25 | 12/05/2012 |
| BARONI HELEN S | \$0 |  | 347/526 | 25 | 10/13/2011 |
| BARONI LEONE (EST OF)+ HELEN | \$0 |  | 342/279 | 25 | 12/22/2010 |

## Building Information

## Building 1 : Section 1

| Year Built: | 1967 |
| :--- | :--- |
| Living Area: | 2,088 |
| Replacement Cost: | $\$ 210,717$ |

## Building Percent

Good:
Replacement Cost
Less Depreciation: $\$ 141,180$

| Building Attributes |  |
| :---: | :---: |
| Field | Description |
| Style | Multi Family |
| Model | Residential |
| Grade: | C+ |
| Stories | 2 |
| Occupancy | 2 |
| Exterior Wall 1 | Wood Shingle |
| Exterior Wall 2 |  |
| Roof Structure | Gable |
| Roof Cover | Asphalt |
| Interior Wall 1 | Drywall |
| Interior Wall 2 |  |
| Interior Flr 1 | Linoleum |
| Interior Flr 2 | Hardwood |
| Heat Fuel | Electric |
| Heat Type: | Elec Baseboard |
| AC Type: | None |
| Total Bedrooms: | 4 Bedrooms |
| Full Bthrms: | 2 |
| Half Baths: | 2 |
| Extra Fixtures |  |
| Total Rooms: | 8 |
| Bath Style: | Average |
| Kitchen Style: | Average |
| Extra Kitchens |  |
| Fireplace(s) | 1 |
| Extra Opening(s) |  |
| Gas Fireplace(s) |  |
| Blocked FPL(s) |  |
| Woodstove(s) |  |
| Bsmt Garage(s) |  |
| SF Fin Bsmt | 0 |
| FBM Quality |  |
| Whirlpool |  |
| Sauna |  |
| Foundation | Poured Conc |

## Building Photo


(http://images.vgsi.com/photos2/HaddamCTPhotos//\00\00\11/5
Building Layout


| Building Sub-Areas (sq ft) |  |  | Legend |
| :--- | :--- | ---: | ---: |
| Code | Description | Gross <br> Area | Living <br> Area |
| FUS | Finished Upper Story | 1,080 | 1,080 |
| BAS | First Floor | 1,008 | 1,008 |
| BSM | Basement | 1,008 | 0 |
| UAT | Unfinished Attic | 1,008 | 0 |
|  |  | 4,104 | 2,088 |


| Extra Features | Legend |
| :--- | :--- | :--- |
| No Data for Extra Features |  |

## Land

| Land Use |  |
| :--- | :--- |
| Use Code | 102 |
| Description | Two Family |
| Zone | R-2A |
| Neighborhood | 400 |
| Alt Land Appr | No |
| Category |  |

## Land Line Valuation <br> Size (Acres) 2 <br> Frontage <br> Depth <br> Assessed Value \$65,160 <br> Appraised Value \$93,090

## Outbuildings

| Outbuildings |  |  |  |  |  | Legend |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Code | Description | Sub Code | Sub Description | Size | Value | Bldg \# |
| FGR1 | Garage | FR | Frame | 288 S.F. | \$4,320 | 1 |
| FGR2 | Garage w/ Loft | FR | Frame | 624 S.F. | \$13,100 | 1 |
| LNT | Lean To |  |  | 288 S.F. | \$1,080 | 1 |
| SHD1 | Shed | FR | Frame | 440 S.F. | \$3,960 | 1 |

## Valuation History

| Appraisal |  |  |  |
| :---: | :---: | :---: | :---: |
| Valuation Year | Improvements | Land | Total |
| 2016 | \$163,640 | \$93,090 | \$256,730 |
| 2015 | \$163,640 | \$93,090 | \$256,730 |
| 2014 | \$172,070 | \$93,090 | \$265,160 |


| Assessment |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | :---: |
| Valuation Year | Improvements |  |  |  |  |
| Land | Total |  |  |  |  |
| 2016 |  | $\$ 114,550$ | $\$ 65,160$ |  |  |
| 2015 |  | $\$ 114,550$ | $\$ 65,160$ | $\$ 179,710$ |  |
| 2014 |  | $\$ 120,450$ | $\$ 65,160$ | $\$ 189,710$ |  |

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## Email Map Link

Copy ar $\quad$ iste the following string into an email to link to the current map view:


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environmental | engineering | due diligence

# RADIO FREQUENCY EMISSIONS ANALYSIS REPORT EVALUATION OF HUMAN EXPOSURE POTENTIAL TO NON-IONIZING EMISSIONS 

SPRINT Existing Facility
Site ID: CT03XC161
SNET - Higganum
139 Morris Hubbard Road Higganum, CT 06441

June 8, 2018
EBI Project Number: 6218004304

| Site Compliance Summary |  |
| :---: | :---: |
| Compliance Status: | COMPLIANT |
| Site total MPE\% of <br> FCC general <br> population <br> allowable limit: | $6.34 \%$ |

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June 8, 2018
SPRINT
Attn: RF Engineering Manager
1 International Boulevard, Suite 800
Mahwah, NJ 07495

## Emissions Analysis for Site: CT03XC161 - SNET - Higganum

EBI Consulting was directed to analyze the proposed SPRINT facility located at $\mathbf{1 3 9}$ Morris Hubbard Road, Higganum, CT, for the purpose of determining whether the emissions from the Proposed SPRINT Antenna Installation located on this property are within specified federal limits.

All information used in this report was analyzed as a percentage of current Maximum Permissible Exposure (\% MPE) as listed in the FCC OET Bulletin 65 Edition 97-01and ANSI/IEEE Std C95.1. The FCC regulates Maximum Permissible Exposure in units of microwatts per square centimeter ( $\mu \mathrm{W} / \mathrm{cm} 2$ ). The number of $\mu \mathrm{W} / \mathrm{cm}^{2}$ calculated at each sample point is called the power density. The exposure limit for power density varies depending upon the frequencies being utilized. Wireless Carriers and Paging Services use different frequency bands each with different exposure limits, therefore it is necessary to report results and limits in terms of percent MPE rather than power density.

All results were compared to the FCC (Federal Communications Commission) radio frequency exposure rules, 47 CFR $1.1307(b)(1)-(b)(3)$, to determine compliance with the Maximum Permissible Exposure (MPE) limits for General Population/Uncontrolled environments as defined below.

General population/uncontrolled exposure limits apply to situations in which the general population may be exposed or in which persons who are exposed as a consequence of their employment may not be made fully aware of the potential for exposure or cannot exercise control over their exposure. Therefore, members of the general population would always be considered under this category when exposure is not employment related, for example, in the case of a telecommunications tower that exposes persons in a nearby residential area.

General population exposure to radio frequencies is regulated and enforced in units of microwatts per square centimeter $\left(\mu \mathrm{W} / \mathrm{cm}^{2}\right)$. The general population exposure limits for the 850 MHz Band is approximately $567 \mu \mathrm{~W} / \mathrm{cm}^{2}$. The general population exposure limit for the 1900 MHz (PCS) and 2500 MHz (BRS) bands is $1000 \mu \mathrm{~W} / \mathrm{cm}^{2}$. Because each carrier will be using different frequency bands, and each frequency band has different exposure limits, it is necessary to report percent of MPE rather than power density.

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Occupational/controlled exposure limits apply to situations in which persons are exposed as a consequence of their employment and in which those persons who are exposed have been made fully aware of the potential for exposure and can exercise control over their exposure. Occupational/controlled exposure limits also apply where exposure is of a transient nature as a result of incidental passage through a location where exposure levels may be above general population/uncontrolled limits (see below), as long as the exposed person has been made fully aware of the potential for exposure and can exercise control over his or her exposure by leaving the area or by some other appropriate means.

Additional details can be found in FCC OET 65.

## CALCULATIONS

Calculations were done for the proposed SPRINT Wireless antenna facility located at $\mathbf{1 3 9}$ Morris Hubbard Road, Higganum, CT, using the equipment information listed below. All calculations were performed per the specifications under FCC OET 65 . Since SPRINT is proposing highly focused directional panel antennas, which project most of the emitted energy out toward the horizon, all calculations were performed assuming a lobe representing the maximum gain of the antenna per the antenna manufactures supplied specifications, minus 10 dB , was focused at the base of the tower. For this report the sample point is the top of a 6 -foot person standing at the base of the tower.

For all calculations, all equipment was calculated using the following assumptions:

1) 1 CDMA channels ( 850 MHz ) were considered for each sector of the proposed installation. These Channels have a transmit power of 20 Watts per Channel.
2) 2 LTE channels ( 850 MHz ) were considered for each sector of the proposed installation. These Channels have a transmit power of 50 Watts per Channel.
3) 5 CDMA channels ( $1900 \mathrm{MHz}(\mathrm{PCS})$ ) were considered for each sector of the proposed installation. These Channels have a transmit power of 16 Watts per Channel.
4) 2 LTE channels ( 1900 MHz (PCS)) were considered for each sector of the proposed installation. These Channels have a transmit power of 40 Watts per Channel.
5) 8 LTE channels ( 2500 MHz (BRS)) were considered for each sector of the proposed installation. These Channels have a transmit power of 20 Watts per Channel.

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6) All radios at the proposed installation were considered to be running at full power and were uncombined in their RF transmissions paths per carrier prescribed configuration. Per FCC OET Bulletin No. 65 - Edition 97-01 recommendations to achieve the maximum anticipated value at each sample point, all power levels emitting from the proposed antenna installation are increased by a factor of 2.56 to account for possible in-phase reflections from the surrounding environment. This is rarely the case, and if so, is never continuous.
7) For the following calculations, the sample point was the top of a 6 -foot person standing at the base of the tower. The maximum gain of the antenna per the antenna manufactures supplied specifications minus 10 dB was used in this direction. This value is a very conservative estimate as gain reductions for these particular antennas are typically much higher in this direction.
8) The antennas used in this modeling are the Commscope NNVV-65B-R4 and the RFS APXVTM14-ALU-I20 for transmission in the $850 \mathrm{MHz}, 1900 \mathrm{MHz}$ (PCS) and 2500 MHz (BRS) frequency bands. This is based on feedback from the carrier with regards to anticipated antenna selection. Maximum gain values for all antennas are listed in the Inventory and Power Data table below. The maximum gain of the antenna per the antenna manufactures supplied specifications, minus 10 dB , was used for all calculations. This value is a very conservative estimate as gain reductions for these particular antennas are typically much higher in this direction.
9) The antenna mounting height centerlines of the proposed antennas are $\mathbf{1 3 1}$ feet above ground level (AGL) for Sector A, $\mathbf{1 3 1}$ feet above ground level (AGL) for Sector B and $\mathbf{1 3 1}$ feet above ground level (AGL) for Sector C.
10) Emissions values for additional carriers were taken from the Connecticut Siting Council active database. Values in this database are provided by the individual carriers themselves.

All calculations were done with respect to uncontrolled / general population threshold limits.

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## SPRINT Site Inventory and Power Data by Antenna

| Sector: | A | Sector: | B | Sector: | C |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Antenna \#: | 1 | Antenna \#: | 1 | Antenna \#: | 1 |
| Make / Model: | Commscope NNVV-65B-R4 | Make / Model: | Commscope NNVV-65B-R4 | Make / Model: | Commscope NNVV-65B-R4 |
| Gain: | 12.75 / 15.05 dBd | Gain: | 12.75 / 15.05 dBd | Gain: | 12.75 / 15.05 dBd |
| Height (AGL): | 131 feet | Height (AGL): | 131 feet | Height (AGL): | 131 feet |
| Frequency Bands | $\begin{gathered} 850 \mathrm{MHz} / \\ 1900 \mathrm{MHz} \text { (PCS) } \end{gathered}$ | Frequency Bands | $\begin{gathered} 850 \mathrm{MHz} / \\ 1900 \mathrm{MHz} \text { (PCS) } \end{gathered}$ | Frequency Bands | $\begin{gathered} 850 \mathrm{MHz} / \\ 1900 \mathrm{MHz}(\mathrm{PCS}) \end{gathered}$ |
| Channel Count | 10 | Channel Count | 10 | Channel Count | 10 |
| Total TX Power(W): | 280 Watts | Total TX <br> Power(W): | 280 Watts | Total TX <br> Power(W): | 280 Watts |
| ERP (W): | 7,378.61 | ERP (W): | 7,378.61 | ERP (W): | 7,378.61 |
| Antenna A1 MPE\% | $\mathbf{2 . 1 0 \%}$ | Antenna B1 MPE\% | 2.10 \% | Antenna C1 MPE\% | $\mathbf{2 . 1 0 \%}$ |
| Antenna \#: | 2 | Antenna \#: | 2 | Antenna \#: | 2 |
| Make / Model: | RFS <br> APXVTM14-ALU- <br> I20 <br> 15.9 | Make / Model: | RFS APXVTM14-ALU- I20 | Make / Model: | RFS APXVTM14-ALU- I20 |
| Gain: | 15.9 dBd | Gain: | 15.9 dBd | Gain: | 15.9 dBd |
| Height (AGL): | 131 feet | Height (AGL): | 131 feet | Height (AGL): | 131 feet |
| Frequency Bands | 2500 MHz (BRS) | Frequency Bands | 2500 MHz (BRS) | Frequency Bands | 2500 MHz (BRS) |
| Channel Count | 8 | Channel Count | 8 | Channel Count | 8 |
| Total TX Power(W): | 160 Watts | Total TX <br> Power(W): | 160 Watts | Total TX <br> Power(W): | 160 Watts |
| ERP (W): | 6,224.72 | ERP (W): | 6,224.72 | ERP (W): | 6,224.72 |
| Antenna A2 MPE\% | 1.43 \% | Antenna B2 <br> MPE\% | 1.43 \% | Antenna C2 MPE\% | 1.43 \% |


| Site Composite MPE\% |  |
| :---: | :---: |
| Carrier | MPE \% |
| SPRINT - Max per sector | $\mathbf{3 . 5 3 \%}$ |
| AT\&T | $1.50 \%$ |
| Nextel | $0.54 \%$ |
| MetroPCS | $0.77 \%$ |
| Site Total MPE \%: | $\mathbf{6 . 3 4 \%}$ |


| SPRINT Sector A Total: | $3.53 \%$ |
| ---: | :---: |
| SPRINT Sector B Total: | $3.53 \%$ |
| SPRINT Sector C Total: | $3.53 \%$ |
| Site Total: |  |



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## Summary

All calculations performed for this analysis yielded results that were within the allowable limits for general population exposure to RF Emissions.

The anticipated maximum composite contributions from the SPRINT facility as well as the site composite emissions value with regards to compliance with FCC's allowable limits for general population exposure to RF Emissions are shown here:

| SPRINT Sector | Power Density Value (\%) |
| ---: | :--- |
| Sector A: | $3.53 \%$ |
| Sector B: | $3.53 \%$ |
| Sector C: | $3.53 \%$ |
| SPRINT Maximum | $3.53 \%$ |
| Total (per sector): |  |
| Site Total: | $6.34 \%$ |
|  |  |
| Site Compliance Status: | COMPLIANT |

The anticipated composite MPE value for this site assuming all carriers present is $\mathbf{6 . 3 4} \%$ of the allowable FCC established general population limit sampled at the ground level. This is based upon values listed in the Connecticut Siting Council database for existing carrier emissions.

FCC guidelines state that if a site is found to be out of compliance (over allowable thresholds), that carriers over a $5 \%$ contribution to the composite value will require measures to bring the site into compliance. For this facility, the composite values calculated were well within the allowable $100 \%$ threshold standard per the federal government.

# FROM ZERO TO INFINIGY <br> the solutions are endless 

## Mount Analysis Report

April 14, 2018

| Sprint Site Number | CT03XC161 |
| :--- | :--- |
| Infinigy Job Number | $526-104$ |
| Client | Airosmith Development |
| Carrier | Sprint |
|  | 139 Morris Hubbard Road <br> Site Location <br>  <br>  <br>  <br> $41^{\circ} g^{\circ} 28^{\prime}, 18.3^{\prime \prime}$ " N NAD83 <br> $72^{\circ} 33^{\prime} 17.6^{\prime \prime}$ W NAD83 |
| Mount Centerline EL. | 131.0 |
| Mount Classification | Platform w/ Handrails |
| Failing Structural Usage | $\mathbf{1 1 8 . 2 \%}$ |
| Passing Structural Usage | $\mathbf{6 4 . 6 \%}$ |
| Overall Result | Contingent Pass- See Required Modification Below. |
| Notes | Install (1) SitePro1 HRK12 36" above existing <br> horizontal |

Upon reviewing the results of this analysis, it is our opinion that the structure meets the specified TIA code requirements. The mounts for the proposed carrier are therefore deemed adequate to support the final loading configuration as listed in this report.


Nathaniel R. Ober, E.I.T.
Northeast Structural Region Lead
AZ CA CO FL GA MD NC NH NJ NY TX WA

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## Introduction

Infinigy Engineering has been requested to perform a mount analysis on the existing Sprint mounts. All supporting documents have been obtained from the client and are assumed to be accurate and applicable to this site. The mount was analyzed using RISA-3D Version 16.0.2 analysis software.

## Supporting Documentation

| Construction Drawings | Infinigy CD's, Job \#526-104, dated April 10, 2018 |
| :--- | :--- |
| Collocation Application | ATC Project \# OAA12589, dated March 13, 2018 |

## Analysis Code Requirements

| Wind Speed | 101 mph (3-Second Gust, $\mathrm{V}_{\text {ASD }}$ ) / 130 mph (3-Second Gust, $\mathrm{V}_{\mathrm{ULT}}$ ) |
| :--- | :--- |
| Wind Speed w/ ice | 40 mph (3-Second Gust, VASD) w/ 0.5" ice |
| TIA Revision | ANSI/TIA-222-G |
| Adopted IBC | $2015 \mathrm{IBC/}$ 2016 Connecticut State Building Code |
| Structure Class | II |
| Exposure Category | C |
| Topographic Category | 1 |
| Calculated Crest Height | 0 ft |

## Conclusion

Upon reviewing the results of this analysis, it is our opinion that the structure meets the specified TIA code requirements. The mounts for the proposed carrier are therefore deemed adequate to support the final loading configuration as listed in this report.

If you have any questions, require additional information, or actual conditions differ from those as detailed in this report please contact me via the information below:

[^0]
## Final Configuration Loading

| Mount CL <br> (ft) | $\begin{gathered} \hline \text { Rad. } \\ \text { HT } \\ (\mathrm{ft}) \\ \hline \end{gathered}$ | Horiz. O/S <br> (ft)* | Qty | Appurtenance | Carrier |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 131.0 | 131.0 | 4.0,8.0 | 6 | Decibel DB844H90E-XY | Sprint |
|  |  | 0.0 | 3 | Commscope NNVV-65B-R4 |  |
|  |  | 12.0 | 3 | RFS APXVM14-ALU-I20 |  |
|  |  | 4.0,8.0 | 6 | Alcatel-Lucent RRH2x50-08 |  |
|  |  | 12.0 | 3 | Alcatel-Lucent TD-RRH8x20-25 |  |
|  |  | 0.0 | 3 | Alcatel-Lucent 1900 MHz 4 x 45 RRH |  |

Structure Usages Existing

| Face Horizontal | 28.7 | Fail |
| :---: | :---: | :---: |
| Standoff | 57.3 | Pass |
| Mount Pipe | 118.2 | Fail |
| RATING $=$ | $\mathbf{1 1 8 . 2}$ | Fail |

## Structure Usages Proposed

| Face Horizontal | 20.5 | Pass |
| :---: | :---: | :---: |
| Standoff | 53.7 | Pass |
| Mount Pipe | 64.6 | Pass |
| RATING $=$ | $\mathbf{6 4 . 6}$ | Pass |

## Assumptions and Limitations

Our structural calculations are completed assuming all information provided to Infinigy Engineering is accurate and applicable to this site. For the purposes of calculations, we assume an overall structure condition of "like new" and all members and connections to be free of corrosion and/or structural defects. The structure owner and/or contractor shall verify the structure's condition prior to installation of any proposed equipment. If actual conditions differ from those described in this report Infinigy Engineering should be notified immediately to complete a revised evaluation.

Our evaluation is completed using standard TIA, AISC, ACI, and ASCE methods and procedures. Our structural results are proprietary and should not be used by others as their own. Infinigy Engineering is not responsible for decisions made by others that are or are not based on our supplied assumptions and conclusions.

This report is an evaluation of the proposed carriers mount structure only and does not reflect adequacy of the existing tower, other mounts, or coax mounting attachments. These elements are assumed to be adequate for the purposes of this analysis and are assumed to have been installed per their manufacturer requirements.


| Appurtenance Name | Elevation (ft) | Total Quantity | Ка | Front Shape | Side Shape | $\begin{gathered} \mathrm{q}_{\mathrm{z}} \\ (\mathrm{psf}) \end{gathered}$ | $\begin{aligned} & \text { EPA } \\ & \left(\mathrm{ft}^{2}\right) \end{aligned}$ | $\begin{gathered} \mathrm{Fz} \\ \text { (lbs) } \end{gathered}$ | $\begin{aligned} & \text { Fx } \\ & \text { (lbs) } \end{aligned}$ | $\begin{gathered} \mathrm{Fz}(60) \\ (\mathrm{lbs}) \end{gathered}$ | $\begin{gathered} \mathrm{Fx}(30) \\ (\mathrm{lbs}) \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Decibel DB844H90E-XY | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 3.06 | 101.74 | 120.14 | 115.54 | 106.34 |
| Decibel DB844H90E-XY | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 3.06 | 101.74 | 120.14 | 115.54 | 106.34 |
| Commscope NNVV-65B-R4 | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 12.27 | 407.83 | 191.10 | 245.28 | 353.65 |
| RFS APXVM14-ALU-120 | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 6.34 | 210.79 | 119.89 | 142.62 | 188.07 |
| Alcatel-Lucent RRH2x50-08 | 131.0 | 6 | 1.00 | Flat | Flat | 33.24 | 1.70 | 56.53 | 42.61 | 46.09 | 53.05 |
| Alcatel-Lucent TD-RRH8×20-25 | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 4.05 | 134.45 | 50.94 | 71.81 | 113.57 |
| Alcatel-Lucent $1900 \mathrm{MHz} 4 \times 45 \mathrm{RRH}$ | 131.0 | 3 | 1.00 | Flat | Flat | 33.24 | 2.31 | 76.86 | 78.93 | 78.41 | 77.38 |
|  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |
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| Infinigy |  |  |
| :--- | :---: | :--- |
| NRO |  |  |
| $526-104$ | RMQP-496 |  |
| Existing Platform |  |  |




| Infinigy |  |  |
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| NRO |  |  |
| $526-104$ | RMQP-496 | Apr 14, 2018 at 3:41 PM |

## Member Primary Data

|  | Label | 1 Joint | $J$ Joint | K Joint | Rotate(deg) | ction/Shape | Type | Design List | terial | ules |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | M1 | N1 | N2 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 2 | M2 | N3 | N4 |  |  | RIGID | None | None | RIGID | Typical |
| 3 | M3 | N5 | N8 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 4 | M4 | N9 | N10 |  |  | RIGID | None | None | RIGID | Typical |
| 5 | M5 | N6 | N11 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 6 | M6 | N12 | N13 |  |  | RIGID | None | None | RIGID | Typical |
| 7 | M7 | N16 | N15 |  |  | 3" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 8 | M8 | N19 | N18 |  |  | 3" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 9 | M9 | N22 | N21 |  |  | 3" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 10 | M10 | N26 | N27 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 11 | M11 | N28 | N29 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 12 | M12 | N30 | N31 |  |  | HSS 4"x4"x1/4" | Beam | None | A53 Gr.B | Typical |
| 13 | M13 | N33 | N34 |  |  | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 14 | M14 | N32 | N35 |  | 270 | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 15 | M15 | N37 | N38 |  |  | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 16 | M16 | N36 | N39 |  | 270 | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 17 | M17 | N41 | N42 |  |  | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 18 | M18 | N40 | N43 |  | 270 | L2"x2"x1/8" | Beam | None | A36 Gr. 36 | Typical |
| 19 | MP1 | N100 | N101 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 20 | MP2 | N102 | N103 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 21 | MP3 | N104 | N105 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 22 | MP4 | N106 | N107 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 23 | MP9 | N116 | N117 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 24 | MP10 | N118 | N119 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 25 | MP11 | N120 | N121 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 26 | MP12 | N122 | N123 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 27 | MP5 | N108 | N109 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 28 | MP6 | N110 | N111 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 29 | MP7 | N112 | N113 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 30 | MP8 | N114 | N115 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 31 | M31 | N85 | N86 |  |  | RIGID | None | None | RIGID | Typical |
| 32 | M32 | N87 | N88 |  |  | RIGID | None | None | RIGID | Typical |
| 33 | M33 | N89 | N90 |  |  | RIGID | None | None | RIGID | Typical |
| 34 | M34 | N92 | N91 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 35 | M35 | N94 | N93 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |
| 36 | M36 | N96 | N95 |  |  | 2" STD Pipe | Beam | None | A53 Gr.B | Typical |

## Material Takeoff

| Material |  | Size | Pieces | Length[in] | Weight[K] |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | General |  |  |  |  |
| 2 | RIGID |  | 6 | 72 | 0 |
| 3 | Total General |  | 6 | 72 | 0 |
| 4 |  |  |  |  |  |
| 5 | Hot Rolled Steel |  |  |  |  |
| 6 | A36 Gr. 36 | L2x2x2 | 6 | 303.1 | 0 |
| 7 | A53 Gr.B | HSS4x4x4 | 6 | 374.3 | 4 |
| 8 | A53 Gr.B | PIPE_2.0 | 15 | 1602 | . 5 |
| 9 | A53 Gr.B | PIPE 3.0 | 3 | 450 | . 3 |
| 10 | Total HR Steel |  | 30 | 2729.4 | 1.1 |

## Basic Load Cases

| BLC Description |  | Category | X Gravity Y Gravity Z Gravity Joint |  |  |  | Point | Distribut...Area(M.. |  | Surface... |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Self Weight | DL |  | -1 |  |  | 36 |  | 3 |  |
| 2 | Wind Load AZI 000 | WLZ |  |  |  |  | 36 |  | 1 |  |
| 3 | Wind Load AZI 090 | WLX |  |  |  |  | 36 |  | 1 |  |
| 4 | Ice Weight | OL1 |  |  |  |  | 36 | 36 |  |  |
| 5 | Wind + Ice Load AZI 000 | OL2 |  |  |  |  | 36 |  | 1 |  |
| 6 | Wind + Ice Load AZI 090 | OL3 |  |  |  |  | 21 |  | 1 |  |
| 7 | Service Live 1 | LL |  |  |  | 6 |  |  |  |  |
| 8 | BLC 1 Transient Area Loads | None |  |  |  |  |  | 45 |  |  |
| 9 | BLC 2 Transient Area Loads | None |  |  |  |  |  | 35 |  |  |
| 10 | BLC 3 Transient Area Loads | None |  |  |  |  |  | 29 |  |  |
| 11 | BLC 5 Transient Area Loads | None |  |  |  |  |  | 35 |  |  |
| 12 | BLC 6 Transient Area Loads | None |  |  |  |  |  | 29 |  |  |

## Load Combinations

|  | Description |  |  |  | BLC | Fac.. | BLCF | Fac.. B | BLC | Fac.. ${ }^{\text {B }}$ |  | Fac.. |  | Fac.. |  | Fac.. | BLCF | Fac.. | BLCF | Fac.. | BLCF | Fac.. | BLCF | Fac... |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | 1.4D |  | Y |  | DL | 1.4 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 2 | 1.2D + 1.6W AZI 000 | Yes | Y |  | DL | 1.2 | W... | 1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 3 | 1.2D + 1.6W AZI 030 | Yes | Y |  | DL | 1.2 | W... 1 | 1.3... | W.. | . 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 4 | 1.2D + 1.6W AZI 060 | Yes | Y |  | DL | 1.2 | W... | 8 | W.. | 1.3. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5 | 1.2D + 1.6W AZI 090 | Yes | Y |  | DL | 1.2 |  |  | W... | 1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 6 | 1.2D + 1.6W AZI 120 | Yes | Y |  | DL | 1.2 | W... | -. 8 | W... | 1.3... |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 7 | 1.2D + 1.6W AZI 150 | Yes | Y |  | DL | 1.2 | W...- | -1.3..N | W... | 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 8 | 1.2D + 1.6W AZI 180 | Yes | Y |  | DL | 1.2 | W... | -1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 9 | 1.2D + 1.6W AZI 210 | Yes | Y |  | DL | 1.2 | W...- | -1.3... | W. | -. 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 10 | 1.2D + 1.6W AZI 240 | Yes | Y |  | DL | 1.2 | W... | -. 8 | W. | -1.3. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 11 | 1.2D + 1.6W AZI 270 | Yes | Y |  | DL | 1.2 |  |  | W... | -1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 12 | 1.2D + 1.6W AZI 300 | Yes | Y |  | DL | 1.2 | W... | 8 | W. | -1.3.. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 13 | 1.2D + 1.6W AZI 330 | Yes | Y |  | DL | 1.2 | W... 1 | 1.3... | W... | -. 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 14 | 0.9D + 1.6W AZI 000 | Yes | Y |  | DL | . 9 | W... | 1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 15 | 0.9D + 1.6W AZI 030 | Yes | Y |  | DL | . 9 | W... 1 | 1.3... | W. | . 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 16 | 0.9D + 1.6W AZI 060 | Yes | Y |  | DL | . 9 | W... | 8 | W... | 1.3.. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 17 | 0.9D + 1.6W AZI 090 | Yes | Y |  | DL | . 9 |  |  | W... | . 1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 18 | 0.9D + 1.6W AZI 120 | Yes | Y |  | DL | . 9 | W... | -. 8 | W.. | 1.3.. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 19 | 0.9D + 1.6W AZI 150 | Yes | Y |  | DL | . 9 | W...- | -1.3... | W... | . 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 20 | 0.9D + 1.6W AZI 180 | Yes | Y |  | DL | . 9 | W...- | -1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 21 | 0.9D + 1.6W AZI 210 | Yes | Y |  | DL | . 9 | W... | -1.3... | W... | -. 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 22 | 0.9D + 1.6W AZI 240 | Yes | Y |  | DL | . 9 | W... | -. 8 | W... | -1.3.. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 23 | 0.9D + 1.6W AZI 270 | Yes | Y |  | DL | . 9 |  |  | W.. | -1.6 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 24 | 0.9D + 1.6W AZI 300 | Yes | Y |  | DL | . 9 | W... | 8 | W. | -1.3. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 25 | 0.9D + 1.6W AZI 330 | Yes | Y |  | DL | . 9 | W... 1 | 1.3... | W.. | -. 8 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 26 | 1.2D + 1.0Di | Yes | Y |  | DL | 1.2 | OL1 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 27 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 O | OL2 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 28 | 1.2D + 1.0Di + 1.0Wi A... | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | . 866 | OL3 | . 5 |  |  |  |  |  |  |  |  |  |  |  |  |
| 29 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | . 5 | OL3. | . 866 |  |  |  |  |  |  |  |  |  |  |  |  |
| 30 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 |  |  | OL3 | 1 |  |  |  |  |  |  |  |  |  |  |  |  |
| 31 | 1.2D + 1.0Di + 1.0Wi A.. Y | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | -. 5 | OL3 | . 866 |  |  |  |  |  |  |  |  |  |  |  |  |
| 32 | 1.2D + 1.0Di + 1.0Wi A.. | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | - 866 | OL3 | . 5 |  |  |  |  |  |  |  |  |  |  |  |  |
| 33 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | -1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 34 | $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi} \mathrm{A}$.. Y | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | - 866 | OL3 | -. 5 |  |  |  |  |  |  |  |  |  |  |  |  |
| 35 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | -. 5 | OL3- | - 866 |  |  |  |  |  |  |  |  |  |  |  |  |
| 36 | 1.2D + 1.0Di + 1.0Wi A..Y | Yes | Y |  | DL | 1.2 | OL1 | 1 |  |  | OL3 | -1 |  |  |  |  |  |  |  |  |  |  |  |  |
| 37 | 1.2D + 1.0Di + 1.0Wi A... | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | . 5 | OL3- | -. 866 |  |  |  |  |  |  |  |  |  |  |  |  |
| 38 | 1.2D + 1.0Di + 1.0Wi A... | Yes | Y |  | DL | 1.2 | OL1 | 1 | OL2 | . 866 | OL3 | -. 5 |  |  |  |  |  |  |  |  |  |  |  |  |
| 39 | 1.2D + 1.5L + 1.0WL (... Y | Yes | Y |  | DL | 1.2 | LL | 1.5 | W... | . 111 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

## Load Combinations (Continued)



## Envelope Joint Reactions

| Joint |  |  | X [Ib] | LC | Y [lb] | Z [lb] |  | LC | MX [lb-ft] | LC | MY [lb-ft] | LC | MZ [lb-ft] LC |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | N6 | max | 1973.766 | 17 | 2589.905 | 2 | 2989.152 | 14 | 5620.367 | 2 | 2085.114 | 23 | 1379.689 | 23 |
| 2 |  | min | -1973.357 | 23 | -756.823 | 20 | -3158.569 | 8 | -2512.564 | 20 | -2086.712 | 17 | -1457.691 | 5 |
| 3 | N5 | max | 2791.296 | 5 | 2576.721 | 10 | 1973.749 | 3 | 1545.375 | 15 | 1135.688 | 19 | 4907.897 | 10 |
| 4 |  | min | -2645.131 | 23 | -745.092 | 16 | -1888.644 | 21 | -3039.775 | 9 | -1137.253 | 25 | -2180.787 | 16 |
| 5 | N1 | max | 2316.887 | 18 | 2577.047 | 6 | 2520.059 | 13 | 1682.443 | 25 | 1561.963 | 14 | 2137.533 | 24 |
| 6 |  | min | -2463.643 | 12 | -744.797 | 24 | -2435.562 | 19 | -3308.766 | 7 | -1560.31 | 20 | -4789.429 | 6 |
| 7 | Totals: | max | 7050.299 | 17 | 6487.6 | 29 | 7179.171 | 2 |  |  |  |  |  |  |
| 8 |  | min | -7050.299 | 11 | 2354.104 | 22 | -7179.171 | 20 |  |  |  |  |  |  |

## Envelope AISC 14th(360-10): LRFD Steel Code Checks

| Member Shape |  |  | Code Check | Lo...... Shear C...Loc[in] . |  |  |  | LC | phi*Pnc...phi*Pnt ...phi*. |  |  | phi*... | EqnH1-... |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | MP3 | PIPE_2.0 | . 646 | 242 | . 094 | 24 |  | 12 | 14916.... | 32130 | 1871.. | 1871.. |  |
| 2 | MP7 | PIPE_2.0 | . 611 | 246 | . 096 | 24 |  | 8 | 14916.... | 32130 | 1871.. | 1871.. | . H1- |
| 3 | MP11 | PIPE_2.0 | . 591 | 245 | 104 | 24 |  | 4 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 4 | MP10 | PIPE_2.0 | . 541 | 24 ... | . 099 | 24 |  | 11 | 14916. | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 5 | M1 | HSS4x.. | . 537 | 07 | . 196 | 0 | z | 9 | 97437.38 | 106155 | 1231.. | 1231.. | . $\mathrm{H} 1-$ |
| 6 | MP6 | PIPE_2.0 | . 528 | 24 ... | . 118 | 24 |  | 12 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 7 | M5 | HSS4x... | . 515 | 03 | . 208 | 0 | z | 5 | 97436.... | 106155 | 1231.. | 1231.. | . $\mathrm{H} 1-$. |
| 8 | MP2 | PIPE_2.0 | . 498 | 246 | 120 | 24 |  | 8 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 9 | M3 | HSS4x... | . 489 | 0 ... | 186 | 0 | z | 13 | 97436.... | 106155 | 1231.. | 1231.. | . $\mathrm{H} 1-$ |
| 10 | M34 | PIPE_2.0 | . 478 | 14...... | . 532 | 4.687 |  | 11 | 6295.422 | 32130 | 1871.. | 1871.. | H3-6 |
| 11 | M35 | PIPE_2.0 | . 464 | 4.6.. 8 | . 560 | 4.688 |  | 2 | 6295.422 | 32130 | 1871.. | 1871.. | H3-6 |
| 12 | MP9 | PIPE_2.0 | . 427 | 24 ... | . 137 | 24 |  | 11 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 13 | MP5 | PIPE_2.0 | . 423 | 242 | . 135 | 24 |  | 3 | 14916.... | 32130 | 1871.. | 1871.. | .. H1- |
| 14 | M36 | PIPE_2.0 | . 420 | 14...... | . 496 | 4.688 |  | 6 | 6295.422 | 32130 | 1871.. | 1871.. | H3-6 |
| 15 | MP8 | PIPE_2.0 | . 415 | 246 | . 149 | 24 |  | 5 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 16 | MP4 | PIPE_2.0 | . 391 | 249 | 165 | 24 |  | 8 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 17 | MP1 | PIPE_2.0 | . 386 | 246 | . 140 | 24 |  | 7 | 14916.... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 18 | MP12 | PIPE_2.0 | . 384 | 242 | . 148 | 24 |  | 12 | 14916... | 32130 | 1871.. | 1871.. | . $\mathrm{H} 1-$ |
| 19 | M11 | HSS4x... | 231 | 31...7 | 118 | 58.6.. | z | 9 | 97364.86 | 106155 | 1231.. | 1231.. | . $\mathrm{H} 1-$ |
| 20 | M12 | HSS4x... | . 229 | 30...... | . 120 | 62.52 | z | 13 | 97364.86 | 106155 | 1231.. | 1231.. | H1- |
| 21 | M10 | HSS4x.. | 227 | 31... 3 | . 118 | 58.6. | z | 5 | 97364.86 | 106155 | 1231.. | 1231.. | . $\mathrm{H} 1-$ |
| 22 | M7 | PIPE_3.0 | 205 | 93...7 7 | . 164 | 95.3... |  | 9 | 28250.... | 65205 | 5748.. | 5748.. | . H 1 - |
| 23 | M9 | PIPE_3.0 | . 205 | 93...3 | . 174 | 95.3... |  | 5 | 28250.... | 65205 | 5748. | 5748. | .. $\mathrm{H} 1-.$. |
| 24 | M8 | PIPE_3.0 | 195 | 93...... | 174 | 95.3. |  | 13 | 28250... | 65205 | 5748.. | 5748.. | . $\mathrm{H} 1-$ |
| 25 | M17 | L2x2x2 | . 148 | 50... 8 | . 011 | 50.52 | y | 33 | 6508.508 | 15908.4 | 402.... | 782.... | H2-1 |
| 26 | M13 | L2x2x2 | 148 | 50...... | . 011 | 50.52 | y | 37 | 6508.508 | 15908.4 | 402. | 794. | H2-1 |
| 27 | M15 | L2x2x2 | 145 | 50...4 | . 011 | 50.52 | V | 29 | 6508.508 | 15908.4 | 402. | 784.... | H2-1 |
| 28 | M18 | L2x2x2 | . 136 | 50... 8 | . 011 | 50.52 | z | 29 | 6508.508 | 15908.4 | 402.... | 780... | H2-1 |
| 29 | M14 | L2x2x2 | . 136 | 50...8 | . 011 | 50.52 | z | 32 | 6508.508 | 15908.4 | 402. | 775.... | .. H2-1 |



Envelope AISC 14th(360-10): LRFD Steel Code Checks (Continued)

| Member Shape |  | Code Check | Lo... | Shear C | Loc[in] | LC | phi*Pnc...phi*Pnt .. | .phi*.. | phi*. | Eqn |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 30 | M16 L2x2x2 | . 134 | 50...... | . 011 | 50.52 z | 37 | 6508.50815908 .4 | 402... | 777... | H2-1 |



THESE OUTLINE SPECIFICATIONS IN CONJUNCTION WITH THE SPRINT STANDARD CONSTRUCTION SPECIFICATIONS, INCLUDING CONTRACT DOCUMENTS
AND THE CONSTRUCTION DRAWINGS DESCRIBE THE WORK TO BE PERFORMED BY THE CONTRACTOR. SECTION 01100 - SCOPE OF WORK
PART 1 - GENERAL
 PERFORMED OY THE
A. THE REQUREMENTS OF THIS SECTION APPLY TO ALL SECTONS IN THIS
B. SPRINT -STANDARD CONSIRCCTON DEEANS FOR WIMEELESS STES•ARE INCLUDED IN


. 4 NATONALY RECOONIZD CODES AND STANDAROS:

. GR-63-CORE NEES REQUIREMENTS: PHYSICAL PROTECTON
5. OR-7B-CORE GENERIC REOUREMENS FOR THE PHYSICAL DESIIN AND
3. GR-1099 CORE, ELECTROMGONEIC COMPAABUUTY AND ELECTRRCAL SAFETY
4. NATONL FRE PROIETMON ASSOCIATON CODES AND
, CODE).
6. INSTIUTE OF ELECTRONIC AND ELECTRICAL ENGINEERS (IEEE)
7. american concrete instinte (ACI)
. AMERICAN WRE PRODUCERS ASSOCATON (AWPA)
9. CONCREIE REINFORCING STEEL INSTTUTE (CRSI)
10. AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATON OFFCLLLL

1. portiand cement associanon (PCA)
2. NATONAL CONCREIE MASONRY ASSOCIATON (NCMA)
3. BRICK INDUSTRY ASSOCLATION (BAA)
4. AMERCAN WELDNG SOCIET (AWS)
5. NATONAL ROOFNG CONTRACTORS ASSOCIITON (NRCA)
6. SHET METAL AND AR CONDTONING CONTRACTORS' NATONaL ASSOCATON
7. DOOR AND haroware INsIIUTE (OHI)
8. OCCUPATIONAL SAFETY AND HEALTH ACT (OSHA)
9. APPLCAEE BULDING CODES INCLLDING UNIFORM GUIDNGG CODE, SOUTHERN 1.5 defintions
A. WORK: THE SUM OF TASKS AND RESPONSIBUIIES IDENTIED IN THE CONTRACT
e. COMPANV: SPRINT CORPORATON
c. ENGINER: SNOMMMOU WITH ARCHITECT ENEGINEER AND AAEE THE DESIGN
D. Contactor: constuction contactor; constructon venorg inomoual or
E. THIR PARTY VENOOR OR AGENCY: A VENOOR OR AGENCY ENGAGED SEPARAELY
F. OFC: OWNER FURNSHED, CONTRACTOR INSTAULED EQUIPMENT
c. CONSTRUCTON MANAEER - AU PRRUECTS RELATEO COMMNMICATON TO FLOW





 Mill


B. DETAUS ARE INIENEED TO SHOW DESION INTEN. MODRICATONS MAY BE









 1. 15 USE OF ELECTRONIC PROUECT MANAGEMENT STSTEMS:

PART 2 - products (not used)
part 3 - execution








 SECTION 01200 - COMPANY FURNISHED MATERIAL AND EQUIPMENI 1.
 1.2 RELATEO DOCUMENS:
A. THE REDUIREMENTS OF THIS SECTIN APPLY TO ALL SECTONS IN THIS
 PART 2 - PRODUCTS (NOT USED)
PART 3 - EXECUTION
3.1 Receip of matrall and equipment
A. A COMPANY FURNSHED MATERLL AND EQUIPMENT IS IDEMTFED ON THE RF DATA
-. THE CoNTRACTOR IS RESPONSIBEE FOR SPRINT PROVOED MATERAL AND
1 accept deuveries as shipeo ano take recelpt.
2. VERIFY COMPLIETENESS AND CONOTION OF ALL DELUERIES.
3. TAKE RESPDNSIIIUTY FOR EQUIPMEN AND PROMDE INSURANCE PROTECTON

5. PROMDE SECURE AND NECESSARY WEAHHER PROTECTED WAREHOUSING.

3. 2 Delveraalles
A. CoMPLIETE SHIPPING AND RECEIPT DOCUMENATION IN ACCORDANCE WTH COMPANT
E. IF APPUCABLE COMPLEIE LOST/STOLENDMMAGED DOCUMENATON REFORT AS
c. UPLOAD DOCUMENTATON INTO SPRRNT STE MAMGGMENT STSTEM (SMS) AND/OR SECTION 01300 - CELL SITE CONSTRUCTION CO.
 1.2 RELATED DOCUMENS:
A. THE REQUINEMENS OF THIS SECTION APPLY TO ALL SECTONS IN THIS
B. SPRIN SSTANOARD CONSTRUCTION DEERUS FOR WIRELESS STES ARE INCLLDED IN
1.3 NOTCE TO PROCEED

A No WORR SHAL COMMENCE PRIRR TO COMPAN'S WRITEN NOTCE TO PROCEED
8. UPON REEEMNG NOICE TO PROCEED, CONTRAGTOR SHAL FUUY PERFORM AL

PART 2 - PRODUCTS (NOT USED)
3.1 FUNCTONAL REQUIREMENTS:
A. THE ACTMMES DESCRIBED IN THIS PARARAPH REPRESEN MNMMUM ATTONS AND


c. mavage and conduct al feld construction service related activmes
d. Provid construction actuties to The exien reguird by the contract

## Sprint

INFINIGY8
FROM ZERO TO INFINIGY


## AIROSMITH <br> DEVELOPM <br> 

|  |
| :---: |





SNET NAME:- HIGGANUM

CT03XC161

139 MORRIS HUBBARD RD. HIGGANUM, CT 06441

SPRINT SPECIFICATIONS
SP-1

## CONTINUE FROM SP-1

1. Perform any reouired stie emmoonmental mitgaton.
2. PREPARE GROUND STIES: PROVDE DE-GRUBING; AND ROUGH AND TNAL
3. MANAGE AND CONDUCT ALL ACTMIES FOR INSTALLTON OF UTILTES
4. NSTAL UNDERGROUND FACIIIIES NCLUDING UNDERGROUND POWER AND
5. Instal above ground grounding ststems.
6. PRODDE NEW HVAC INSTALATONS AND MODIFCATONS.
7. Install "H-rrames", cabinets and shelters as indicated.
8. InSTAL ROADS, ACCESS WAYS, CURBS AND DRANS AS INICATED
9. ACCOMPLSH REQUIRED MODIFCCATON OF EXISTNG FACIIIES.
10. PROODE ANIENNA SUPPORT STRUCTURE FOUNDATOI
11. Provide slabs and equipment platorms.
12. INSALL COMPOUND FENCING, SIGHT SHELEDING, LANDSCAPING AND ACCESS 13. PERForm inspecton and materal testing as reaurid hereinafter. 14. Conduct stie resistance to earth testing as reoured heremartier 15. INTALL FXED GENERATOR SETS AND OTHER STANDBY POWER SOLITIONS.
13. INSTAL TOWERS, ANTENA SUPPORT STRUCTURES AND PLATFORMS ON


14. PERFORM ANTENNAL AND COAX SWEEP TESTNG AND MAKE ANY AND ALL

3.2 GENERAL REQUREMENTS FOR CML CONSTRUCTION:

日. EQupment roows
c. Contractor shal tâe All reasonable precautons to discover and




 conduct testng as required heren.
3.3 Delverables:
A. CoNTRACTOR SHAL RENEW, APpROVE AND SUEMT TO SPRIT SHOP DRAWINS
a. PRoMDE DOCUMENTATIN ICLUDNG, BUT NOT LMITED TO. THE FOLIOWNG. into sms.
15. ALL CORRESPONEENCE AND PRELMMMARY CONSTRUCTON REPORTS.
16. PROUECT PROGRESS REPORTS.
17. CIML CONSTRUCTION START DATE (POPULATE RELD IN SMS AND/OR FORWARD
18. ELECTRCAL SERMCE COMPLETION DATE (POPULATE REL IN SMS AND/OR
19. LINES AND ANIENN NSTALL DATE (POPULIATE FELD IN SMS AND/OR
20. POWER INSTALL DATE (POPULATE REL IN SMS AND/OR FORMARD
21. TELCO REAOY DATE (POPULATE TEL IN SMS AND/OR FORWARD
22. PPC (OR SHELIER) INSTALL DATE (POPULATE FELD IN SMS AND/OR FORWARD
NOTICAOON).
23. TOWER CONSTTUCCON START DATE (POPVULATE FEL IN SMS AND/OR
24. TOWER CONSTRUCTON COMPLEIE DATE (POPULLATE REL IN SMS AND/OR

25. NELWORK OPERATONS HANDOFF CHECKLST (HOC WALK) COMPLEE (UPLOAD
26. CNL CONSTRUCTON COMPLLETE DATE (POPULATE FIEL IN SMS AND/OR
27. ste constructon progress photos unloaded into sms.

SECTION 01400 - SUBMITALS \& - TESTS
 1.2 RELATED DOCUMENT:
A. THE REOUIREMENS OF THIS SECTION APPLY TO AL SECTIONS IN THIS

日. SPRNT STANDARD CONSTRUCTON DETNUS FOR WIRELESS STES ARE INCLUDED IN 1.3 submitals:
A. THE Work in ALl Aspecrs shal comply wit the constructon drawing
B. Suamt the followng to compant representative for approval

1. CONCREEE MIX-DESIGNS FOR TOWER FOUNDATONS, ANCHORS PIERS, AND
2. CONCREIE aREAK TESTS AS SPECIIFED HEREIN.
3. SPECML FNISHES FOR INERIOR SPACES, IF ANY.
4. AL EROUIPMEN AND MAIERALS SO IDENTRED ON THE CONSTRUCTON 5. chemical grounoing desigen
D. AITERNATES: AT HE COMPAN'S REQUST, ANY AIERRATVES TO THE MATERNLS

1.4 TESTS AND INSPECTIONS:
A. THE CONTRACTOR SHAL EE RESPONSIEE FOR AL CONSTRUCTON TESTS,
B. COONTRCCTOR SHAL ACCOMPUSH TESTING INCLUDING BUT NOT UMITED TO THE 1. COAX SWEEPS AND REER TESTS PER TS-0200 REV 4 ANIENNA UNE
5. ACL AZZMUTH AND DOWNLT USING EEETTONIC COMMERCILL

c. REOURED CLLOSEOU DOCUMENTATON INCLUDES, BUT IS NOT LMITED TO THE

6. SCANABE BARCODE PHOTOORAPHS OF TOWER TOP AND INACCESSIBLE
7. ALL AVALABLE JURSDICTONLL INFormaton
8. PdF sCan of redunes produced in reed
9. EEECRONC AS-BULT DRAMNGG IN ATOCAD ANN PDF FFRMMTS. AN REL
 WI N No BE ACEPED CHAGES SHAL BE HOGLCHM
10. Len wavers

## Sprint $\psi$

. . pament applcaton
8. REOURED FNNA CONSTRUCTON PHotos
9. CONSTRUCTON ANO COMMISSIONNG CHECKLST COMPLETE WTH NO DEFCIENT
10. AL POST NTP TASKS INCUOING DOCUMMEN UPLLOADS COMPLETED IN STERRA
(SPRRINS DOCUMENT REPOSTORY OF RECCORD).
1.5 COMMISSIONNG: PEEFORM ALL COMMISSIONNG AS REQUIRED GY APPUCABLE
MOP
1.6 intigegaton: perform all integraton activties as reguired ey appucable

PART 2 - PRODUCTS (NOT USED)
PART 3 - EXECUTION
3. 1 Reouirements for testing:
A. THRD PaRTY TESTNG Agencr


SOIL, ROCK, AND GROUNDWAIER CONDITINS.
2. THE THIR PART TESTNG AGENCY IS TO OE FAMLAR WTH THE APPLCABE


3.2 REOUIRED TESTS:


1. CONCRER CYMNDR RREAK TESTS FOR THE TOWER AND ANCHOR
2. ASPMAT RONOWAY COMPACTED THMCKNESS, SURFACE SMOOTHESSS, AND
3. FELD QUAUM CONTROL TESTNG AS SPECIFED IN SECTON: PORTLAND CEMENT
4. TESTNG REQURED UNOER SECTIN: AGGREGATE RASE FOR ACCESS ROADS,
5. Structural eacknll compacton tests for the tower foundaton.
6. STE RESSITANCE TO EARTH TESTING PER EXHIIIT: CEL STE GROUNOING
7. ANIENNA AND COAX SWEEP TESTS PER EXHIBT: ANTENNA TRANSMISSIIN UNE
g. grounoing at antenna masts for gps and antennas
8. ALL OTHER TESTS REQUIRED EY COMPANY OR JURISOCCTION.
3.3 REQUIRED INSPECTONS
A. SChedule inspectons wth company representaive.
B. CONDUCT INSPECTONS INCLUDING But Not LMITED to THE FOLOwing:



9. PRE- AND POST-CONSTRUCTON ROOTTOP AND STRUCTURAL INSPECTIONS ON
10. TOWER ERECTION SECTON STACKING AND PLATFORM ATACHMENT DOCUMENIED
11. ANIENA AZIMUT, DOWN RIT AND PRER SUNLGH TTOL SUNSIGHT

INFINIGY8
FROM ERO TO INFINIGY



AIROSMITH






SNET - HIGGANUM

CT03XC161

139 MORRIS HUBBARD RD HIGGANUM, CT 06441

SPRINT SPECIFICATIONS
SP-2

## ONTINUE FROM SP-2

7. VERIICATON DOCUMENTED WIT THE ANTENNA CHECKLST REPORT, QY AEE,

8. COAX SWEEP AND RBER TESTNG DOCUMENTS SUBMITED VA SMS FOR RF
9. SCAN-ABEE BARCODE PHOTOGRAPHS OF TOWER TOP AND INACCESSIDLE
10. ALL AVALABEE JURRSOICTONAL INORRMATON
11. PDF SCAN OF REDLNES PRODUCED IN FELD

D. CONSTRUCTNN ISTPE MONS AND CORRECNI MEAURES SHAL QE DOCUMENED



12. Concrete mix and culnotr break reports.
13. SITUCTURAL BaCKFLL COMPACTON REPORTS.
14. SIE RESISTANCE TO EARTH TEST
15. ANTENNA AZIMUTH AND DOWN tLT VERIfCation
16. TOWER ERECTON INSPECTONS AND MESUREMENTS DOCUMENTNG TOWER
17. COAX CABLES SWEEP TESTS PER COMPAN'S "ANTENNA LNE ACCEPTANCE
b. REQUIRED CLOSEOUT DOCUMENATON INCLUDES THE FOLOWING:

inolcaning depth.

18. CONCREIE FORMS AND RENFORCING: CONCRERE FORMNG AT TOWER AND
 ANCHOR ON GURED TOWERS, OEFORE CONCREIE POUR.




19. ROOF TOPS: PRE-CONSTVUCTON AND POST-CONSTRUCTON YSUAL INSPECTON

STE LAYOUT- PHOTOORRPFS OF THE OVERAL COMPOUND, INCLUDING
EOUIPMENT PLAFORM FROM AL FOUR CORNERS.



20. ANY AND ALL SUBMITALS BY THE JURISDICTION OR COMPAYY.

SECTION 01400 - SUBMITTALS \& TESTS
PART 1 - GENERAL

1.2 RELATED DOCUMENTS:
A. THE RECOURREMENTS OF THIS SECTION APPLY TO AL SECTIONS IN THIS
B. SPRIN STTNDARD CONSIRUCTON DEANLS FOR WIRELESS STES" ARE INCLUDED IN PART 2 - PRODUCTS (NOT USED)
Part 3 - execution


8. Report ingoriaiton wi le transmie to spriv va elecroonc mens As 3. 2 PROUECT CONEERENCE CALS:
 3.3 Prouect tracking in sms:
A. CONTRACTOR SHALL PROYDE SCHEDULE UPDATES AND PROUECTONS IN THE SMS 3.4 ADDITONAL REPORTNG:
 3.5 PROLECT PHOTOGRAPHS:


## 1. ISHELTER AND TOWER OVERMEW

2. Tower foundation(s) - forms and steel before pour (EACH ANCHOR
3. TOWER FOUNDATON(S) POUR WTH VBRATOR IN USE (EACH ANCHOR ON
4. Tower steel as aeng instaled into hole (show anchor steel on
GUVED towers).
5. Photos of tower secton stacking.
6. CONCRETE TESTNG / SAMPLES.
7. PLACING OF ANCHOR BOLTS IN TOWER FOUNDATON.
8. Bulling/mater tank from road for tenant Improvement or comments.
9. SHELTER FOUNDATON--FORMS AND STEEL BEFORE POURING.
10. SHELIER FOUNDATON POUR WTH YBERTOR IN USE.
11. COAX CABLE ENTRY INTO SHELIER.
12. PLATFORM MECHANCCLL CONNECTONS To TOWER/MONOPOLE
13. Roortop pre and post constructon photos to incluoe pentiratons
14. pHotos of tower top coax une color cooing and color cooing at
GROUND
LVveL 15. Photos of all approprate company or regulatory signage.
15. PHOTOS OF EQUIPMENT BOLT DOWN INIDE SHELTER.
16. POWER AND TLLCO ENTRNCE TO COMPAN ENLCOSURE AND POWER AND 19. ELECTRICAL TRENCH(s) WTH ELECTRCAL / CONOUT BEFORE backRL
17. ELECTRCCAL TRENCH(S) WTH FOL-EACKED TAPE BEFORE FURTHER GACKFLL 20. TELCO TRENCH WTH TELEPHONE / CONDUT BEFORE BACKFLL
18. TELCO TRENCH WTH FOLL-EACKED TAPE BEFORE FURTHER BACKFLL
 25. AlL BTS GROUND CONNECTIONS.
19. All ground test weus.
20. antenna ground bar and equipment ground bar.
21. ADDITONAL GROUNONG POINTS on towers ABove 200',
22. ADDIMONAL GROUNDING POINTS on towers above 200
23. HNAC UNTS INCLUDING CONDENSERS ON SPLT STSTEMS.
24. GPS ANIENNAS
25. CABLE TRAY AND/OR WavEGUIDE bRIGEE.
26. DOGHOUSE/CABLE EXT RROM ROOF.
27. EACH SECTOR OF ANTENNS: ONE PHOTOGRPH LOOKING AT THE SETOR AND 34. master bus bar.
28. TELCO BOARD AND NU.
29. ELECTRICAL DISTREUTION WALL
30. CABE ENTPY WTH SURCE SUPPRES
31. ENTRANCE TO EOUPMENT ROON
32. coax weatherproofng-Top and botiom of tower
33. coax grounoing -top and bottom of tower
34. ANTENNA aND MAST Grounding.
35. LANDSCAPNG - WHERE APPLCABLE


## Sprint

INFINIGY8
FROM ZERO TO INFINIGY
 j08 MMES:R 58 F-124

AIROSMITH


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SPRINT SPECIFICATIONS
22. SHELER GROUND-RRG TRENCH WTH GROUND-WIRE BEFORE BACKFLL (SHOW
23. TOWER GROUND-RING TRENCH WITH GROUND-WRE BEFORE BACKRLL (SHOW










AMERICANTOWER ${ }^{*}$
CORPORATION
This report was prepared for American Tower Corporation by
T O W ER
ENGINEERING
PROFESSIONALS

## Structural Analysis Report

| Structure | $:$ 150ft Monopole |
| :--- | :--- |
| ATC Site Name | $:$ Hddm - Haddam, CT |
| ATC Site Number | $: 302494$ |
| Engineering Number | $:$ OAA712589_C3_05 |
| Proposed Carrier | $:$ Sprint Nextel |
| Carrier Site Name | $:$ SNET - HIGGANUM |
| Carrier Site Number | $:$ CT03XC161 |
| Site Location | $:$ 139 Morris Hubbard Rd |
|  | Higganum, CT 06441-4307 |
|  | 41.472200,-72.554600 |
| County | $:$ MIDDLESEX |
| Date | : $93 \%$ |
| Max Usage 2018 |  |
| Result | Pass |
| Prepared By: |  |
| Aaron T. Rucker |  |
| TEP |  |

COA: PEC. 0001553

Eng. Number OAA712589_C3_05
April 24, 2018

## Table of Contents

Introduction ..... 1
Supporting Documents ..... 1
Analysis ..... 1
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Equipment to be Removed ..... 2
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Structure Usages ..... 3
Foundations ..... 3
Deflection, Twist, and Sway ..... 3
Standard Conditions ..... 4
Calculations ..... Attached

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Page 1

## Introduction

The purpose of this report is to summarize results of a structural analysis performed on the 150 ft monopole to reflect the change in loading by Sprint Nextel.

## Supporting Documents

| Tower Drawings | ITT Meyer Type "B", Mapping by Smith Cullum, Acq. \#CT-0027, dated August 23, 2001 |
| :--- | :--- |
| Foundation Drawing | Mapping by FDH, Project \#01-1004, dated October 12, 2001 |
| Geotechnical Report | GeoTechnologies Project \#1-04-0265-EA, dated March 4, 2004 |
| Modifications | VSI Job \#MR-311, Rev. 1, dated April 28, 2006 |

## Analysis

The tower was analyzed using American Tower Corporation's tower analysis software. This program considers an elastic three-dimensional model and second-order effects per ANSI/TIA-222.

| Basic Wind Speed: | $101 \mathrm{mph}\left(3-\right.$ Second Gust, $\mathrm{V}_{\text {asd }} / 130 \mathrm{mph}$ (3-Second Gust, $\left.\mathrm{V}_{\text {utt }}\right)$ |
| :--- | :--- |
| Basic Wind Speed w/ Ice: | $50 \mathrm{mph}(3-$ Second Gust) w/3" radial ice concurrent |
| Code: | ANSI/TIA-222-G/2012 IBC $/ 2016$ Connecticut State Building Code |
| Structure Class: | II |
| Exposure Category: | B |
| Topographic Category: | 1 |
| Crest Height: | 0 ft |
| Spectral Response: | Ss $=0.18, \mathrm{~S}_{1}=0.06$ |
| Site Class: | D-Stiff Soil |

## Conclusion

Based on the analysis results, the structure meets the requirements per the applicable codes listed above. The tower and foundation can support the equipment as described in this report.

If you have any questions or require additional information, please contact American Tower via email at Engineering@americantower.com. Please include the American Tower site name, site number, and engineering number in the subject line for any questions.

## Existing and Reserved Equipment

| Elevation ${ }^{1}(\mathrm{ft})$ |  | Qty | Antenna | Mount Type | Lines | Carrier |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Mount | RAD |  |  |  |  |  |
| 150.0 | 154.0 | 6 | Kaelus DBC0061F1V51-2 | Platform w/ Handrails | (12) $15 / 8^{\prime \prime}$ Coax <br> (4) 0.78" 8 AWG 6 <br> (2) $3^{\prime \prime}$ Conduit <br> (2) 0.39" Fiber Trunk | AT\&T Mobility |
|  |  | 2 | Raycap DC6-48-60-18-8F ("Squid") |  |  |  |
|  |  | 6 | Powerwave LGP17201 |  |  |  |
|  |  | 3 | Ericsson RRUS 11 (Band 12) (55 lb) |  |  |  |
|  |  | 3 | Ericsson RRUS 32 ( 50.8 lbs ) |  |  |  |
|  |  | 3 | Ericsson RRUS 32 B2 |  |  |  |
|  |  | 3 | Powerwave 7770.00 |  |  |  |
|  |  | 2 | KMW AM-X-CD-16-65-00T-RET |  |  |  |
|  |  | 3 | Quintel QS66512-2 |  |  |  |
|  |  | 1 | Powerwave P65-17-XLH-RR (50 lbs) |  |  |  |
|  | 160.0 | 2 | Decibel DB910CE-M |  | (2) 15/8" Coax | Sprint Nextel |
| 141.0 | 141.0 | 3 | RFS APXV18-206517LS-C | Flush | (6) 15/8" Coax | Metro PCS |
| 131.0 | 131.0 | 6 | Decibel DB844H90E-XY | Low Profile Platform | (12) $11 / 4$ " Coax | Sprint Nextel |

## Equipment to be Removed

| Elevation ${ }^{1}(\mathrm{ft})$ |  | Qty | Antenna | Mount Type | Lines | Carrier |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Mount | RAD |  |  |  |  |  |
| 131.0 | 131.0 | 6 | Decibel DB844H90E-XY | - | - | Sprint Nextel |

## Proposed Equipment

| Elevation ${ }^{1}$ (ft) |  | Qty | Antenna | Mount Type | Lines | Carrier |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Mount | RAD |  |  |  |  |  |
| 131.0 | 131.0 | 6 | Alcatel-Lucent RRH2x50-08 | Low Profile Platform with HRK12 Handrail Kit | (4) $11 / 4$ " Hybriflex | Sprint Nextel |
|  |  | 3 | Alcatel-Lucent $1900 \mathrm{MHz} 4 \times 45 \mathrm{RRH}$ |  |  |  |
|  |  | 3 | Alcatel-Lucent TD-RRH8×20-25 w/ Solar Shield |  |  |  |
|  |  | 3 | RFS APXVTM14-ALU-120 |  |  |  |
|  |  | 3 | Commscope NNVV-65B-R4 |  |  |  |

${ }^{1}$ Mount elevation is defined as height above bottom of steel structure to the bottom of mount, RAD elevation is defined as center of antenna above ground level (AGL).

Install proposed coax inside the pole shaft.

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April 24, 2018
Page 3

## Structure Usages

| Structural Component | Controlling Usage | Pass/Fail |
| :---: | :---: | :---: |
| Anchor Bolts | $90 \%$ | Pass |
| Shaft | $86 \%$ | Pass |
| Base Plate | $29 \%$ | Pass |
| Flanges | $82 \%$ | Pass |
| Reinforcement | $79 \%$ | Pass |

## Foundations

| Reaction Component | Analysis Reactions | \% of Usage |
| :---: | :---: | :---: |
| Moment (Kips-Ft) | $2,345.1$ | $93 \%$ |
| Axial (Kips) | 67.1 | $50 \%$ |
| Shear (Kips) | 22.1 | $11 \%$ |

The structure base reactions resulting from this analysis were found to be acceptable through analysis based on geotechnical and foundation information, therefore no modification or reinforcement of the foundation will be required.

Deflection and Sway*

| Antenna Elevation (ft) | Antenna | Carrier | Deflection <br> (ft) | Sway (Rotation) $\left({ }^{\circ}\right)$ |
| :---: | :---: | :---: | :---: | :---: |
| 131.0 | Alcatel-Lucent RRH2x50-08 | Sprint Nextel | 1.796 | 1.728 |
|  | Alcatel-Lucent $1900 \mathrm{MHz} 4 \times 45 \mathrm{RRH}$ |  |  |  |
|  | Alcatel-Lucent TD-RRH8×20-25 w/ Solar Shield |  |  |  |
|  | RFS APXVTM14-ALU-I20 |  |  |  |
|  | Commscope NNVV-65B-R4 |  |  |  |

[^1]
## Standard Conditions

All engineering services performed by A.T. Engineering Service, PLLC are prepared on the basis that the information used is current and correct. This information may consist of, but is not limited to the following:

- Information supplied by the client regarding antenna, mounts and feed line loading
- Information from drawings, design and analysis documents, and field notes in the possession of A.T. Engineering Service, PLLC

It is the responsibility of the client to ensure that the information provided to A.T. Engineering Service, PLLC and used in the performance of our engineering services is correct and complete.

All assets of American Tower Corporation, its affiliates and subsidiaries (collectively "American Tower") are inspected at regular intervals. Based upon these inspections and in the absence of information to the contrary, American Tower assumes that all structures were constructed in accordance with the drawings and specifications.

Unless explicitly agreed by both the client and A.T. Engineering Service, PLLC, all services will be performed in accordance with the current revision of ANSI/TIA-222.

All services are performed, results obtained, and recommendations made in accordance with generally accepted engineering principles and practices. A.T. Engineering Service, PLLC is not responsible for the conclusions, opinions and recommendations made by others based on the information supplied herein.
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| Job Information |  |
| :---: | :---: |
| Pole : 302494 | Code: ANSI/TIA-222-G |
| Location : Hddm - Haddam, CT |  |
| Description : 150 ft ITT Meyer Type | B" Monopole |
| Client : SPRINT NEXTEL | Struct Class : II |
| Shape : 12 Sides | Exposure : B |
| Height : $150.00 \quad$ (ft) | Topo : 1 |
| Base Elev (ft): 0.00 |  |
| Taper: 0.15670 (in/ft) |  |
|  |  |
|  |  |


| Sections Properties |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Shaft Section | Length <br> (ft) | Diam <br> Accro Top | eter (in) ss Flats Bottom | Thick (in) | Joint <br> Type | Overlap Length (in) | Shape | Steel Grade (ksi) |
| 1 | 35.667 | 31.79 | 37.38 | 0.375 |  | 0.000 | 12 Sides | 65 |
| 2 | 42.000 | 26.48 | 33.06 | 0.313 | Slip Joint | 50.000 | 12 Sides | 65 |
| 3 | 40.000 | 21.26 | 27.53 | 0.250 | Slip Joint | 42.000 | 12 Sides | 65 |
| 4 | 40.000 | 15.00 | 21.26 | 0.188 | Butt Joint | 0.000 | 12 Sides | 65 |


| Discrete Appurtenance |  |  |  |
| :---: | :---: | :---: | :---: |
| Attach <br> Elev (ft) | Force <br> Elev (ft) | Qty | Description |
| 150.000 | 150.000 | 1 | Round Platform w/ Handrails |
| 150.000 | 154.000 |  | Powerwave P65-17-XLH-RR (50 |
| 150.000 | 154.000 | 3 | Quintel QS66512-2 |
| 150.000 | 154.000 | 2 | KMW AM-X-CD-16-65-00T-RET |
| 150.000 | 154.000 | 3 | Powerwave Allgon 7770.00 |
| 150.000 | 154.000 | 3 | Ericsson RRUS 32 B2 |
| 150.000 | 154.000 | 3 | Ericsson RRUS 32 ( 50.8 lbs ) |
| 150.000 | 154.000 | 3 | Ericsson RRUS 11 (Band 12) (55 |
| 150.000 | 154.000 | 6 | Powerwave LGP17201 |
| 150.000 | 154.000 | 1 | Raycap DC6-48-60-18-8F |
| 150.000 | 154.000 | 1 | Raycap DC6-48-60-18-8F |
| 150.000 | 160.000 | 2 | Decibel DB910CE-M |
| 150.000 | 154.000 | 6 | Kaelus DBC0061F1V51-2 |
| 141.000 | 141.000 | 3 | RFS APXV18-206517LS-C |
| 131.000 | 131.000 | 3 | Commscope NNVV-65B-R4 |
| 131.000 | 131.000 | 3 | Alcatel-Lucent $1900 \mathrm{MHz} 4 \times 45$ |
| 131.000 | 131.000 | 3 | Alcatel-Lucent TD-RRH8x20-25 |
| 131.000 | 131.000 |  | Alcatel-Lucent RRH $2 \times 50-08$ |
| 131.000 | 131.000 | , | RFS APXVTM14-ALU-120 |
| 131.000 | 131.000 | 1 | Round Platform w/ Handrails |
| 131.000 | 131.000 | 6 | Decibel DB844H90E-XY |


| Linear Appurtenance |  |  |  |
| :---: | :---: | :--- | :--- |
| Elev (ft) |  |  | Exposed |
| From | To | Description | To Wind |
| 8.000 | 131.0 | $11 / 4^{\prime \prime}$ Coax | Yes |
| 8.000 | 131.0 | $114^{\prime \prime}$ Hybriflex | Yes |
| 8.000 | 141.0 | $158^{\prime \prime}$ Coax | Yes |
| 8.000 | 150.0 | $0.39 "(10 \mathrm{~mm})$ | No |
| 8.000 | 150.0 | $0.78^{\prime \prime} 8$ AWG 6 | No |
| 8.000 | 150.0 | $15 / 8^{\prime \prime}$ Coax | No |
| 8.000 | 150.0 | $15 / 8^{\prime \prime}$ Coax | No |
| 8.000 | 150.0 | 3" Conduit | No |
| 0.000 | 118.0 | Reinf. | Yes |


| Load Cases |  |
| :--- | :--- |
| $1.2 \mathrm{D}+1.6 \mathrm{~W}$ | 101 mph with No Ice |
| $0.9 \mathrm{D}+1.6 \mathrm{~W}$ | 101 mph with No Ice (Reduced DL) |
| $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ | 50 mph with 0.75 in Radial Ice |



Load Case : 1.2D + 1.6W
Max Ratio $\mathbf{8 5 . 8 9 \%}$ at 116.5 ft


| Site Number: 302494 | Code: ANSI/TIA-222-G | © 2007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number:OAA712589_C3_05 | $4 / 24 / 2018$ 5:53:14 PM |
| Customer: | SPRINT NEXTEL |  |  |


|  |  | Analysis Parameters |  |
| :---: | :---: | :---: | :---: |
| Location : | MIDDLESEX County, CT | Height (ft) : | 150 |
| Code : | ANSI/TIA-222-G | Base Diameter (in) | 37.38 |
| Shape: | 12 Sides | Top Diameter (in) | 15.00 |
| Pole Type : | Taper | Taper (in/ft) : | 0.157 |
| Pole Manfacturer | ITT Meyer | Rotation (deg) : | 0.00 |


|  |  | Ice \& Wind Parameters |  |
| :--- | :--- | :--- | :---: |
| Structure Class: | II | Design Wind Speed Without Ice: | 101 mph |
| Exposure Category: | B | Design Wind Speed With Ice: | 50 mph |
| Topographic Category: | 1 | Operational Wind Speed: | 60 mph |
| Crest Height: | 0 ft | Design Ice Thickness: | 0.75 in |



Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

Code: ANSI/TIA-222-G © 2007-2018 by ATC IP LLC. All rights reserved.
Engineering Number:OAA712589_C3_05
4/24/2018 5:53:14 PM


## Discrete Appurtenance Properties

| Attach <br> Elev <br> (ft) | Description | Qty | Distance From Face (ft) | Vert <br> Ecc <br> (ft) | Weight (b) | No Ice EPAa (sf) | Orientation Factor |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 150.00 | Decibel DB910CE-M | 2 | 0.000 | 10.000 | 8.00 | 1.280 | 1.00 |
| 150.00 | Ericsson RRUS 11 (Band 12) (55 | 3 | 0.000 | 4.000 | 55.00 | 2.520 | 0.67 |
| 150.00 | Ericsson RRUS 32 ( 50.8 lbs ) | 3 | 0.000 | 4.000 | 50.80 | 2.690 | 0.67 |
| 150.00 | Ericsson RRUS 32 B2 | 3 | 0.000 | 4.000 | 53.00 | 2.740 | 0.67 |
| 150.00 | Kaelus DBC0061F1V51-2 | 6 | 0.000 | 4.000 | 25.50 | 0.510 | 0.50 |
| 150.00 | KMW AM-X-CD-16-65-00T-RET | 2 | 0.000 | 4.000 | 48.50 | 8.020 | 0.67 |
| 150.00 | Powerwave Allgon 7770.00 | 3 | 0.000 | 4.000 | 35.00 | 5.510 | 0.65 |
| 150.00 | Powerwave LGP 17201 | 6 | 0.000 | 4.000 | 31.00 | 1.670 | 0.50 |
| 150.00 | Powerwave P65-17-XLH-RR (50 | 1 | 0.000 | 4.000 | 50.00 | 11.470 | 0.67 |
| 150.00 | Quintel QS66512-2 | 3 | 0.000 | 4.000 | 111.00 | 8.130 | 0.74 |
| 150.00 | Raycap DC6-48-60-18-8F ("Squid | 1 | 0.000 | 4.000 | 31.80 | 1.280 | 1.00 |
| 150.00 | Raycap DC6-48-60-18-8F ("Squid | 1 | 0.000 | 4.000 | 31.80 | 1.280 | 1.00 |
| 150.00 | Round Platform w/ Handrails | 1 | 0.000 | 0.000 | 2000.00 | 27.100 | 1.00 |
| 141.00 | RFS APXV18-206517LS-C | 3 | 0.000 | 0.000 | 22.00 | 5.020 | 0.68 |
| 131.00 | Alcatel-Lucent $1900 \mathrm{MHz} \mathrm{4} \mathrm{\times 45} \mathrm{R}$ | 3 | 0.000 | 0.000 | 60.00 | 2.320 | 0.67 |
| 131.00 | Alcatel-Lucent RRH2×50-08 | 6 | 0.000 | 0.000 | 52.90 | 1.700 | 0.50 |
| 131.00 | Alcatel-Lucent TD-RRH8×20-25 w | 3 | 0.000 | 0.000 | 70.00 | 4.050 | 0.67 |
| 131.00 | Commscope NNVV-65B-R4 | 3 | 0.000 | 0.000 | 77.40 | 12.270 | 0.64 |
| 131.00 | Decibel DB844H90E-XY | 6 | 0.000 | 0.000 | 14.00 | 3.610 | 0.74 |
| 131.00 | RFS APXVTM14-ALU-I20 | 3 | 0.000 | 0.000 | 56.20 | 6.340 | 0.66 |
| 131.00 | Round Platform w/ Handrails | 1 | 0.000 | 0.000 | 2000.00 | 27.200 | 1.00 |
| Totals | Num Loadings:21 | 63 |  |  | 6738.20 |  |  |

## Linear Appurtenance Properties

| Elev From (ft) | $\begin{aligned} & \text { Elev } \\ & \text { To } \\ & \text { (ft) } \\ & \hline \end{aligned}$ | Qty | Description | Coax Diameter (in) | Coax Weight ( $\mathrm{lb} / \mathrm{ft}$ ) | Flat | Projected Width (in) | Exposed <br> To Wind | Carrier |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 8.00 | 150.00 | 2 | 0.39" (10mm) Fiber | 0.39 | 0.06 | N | 0.00 | N | AT\&T Mobility |
| 8.00 | 150.00 | 4 | 0.78" 8 AWG 6 | 0.78 | 0.59 | N | 0.00 | N | AT\&T Mobility |
| 8.00 | 150.00 | 12 | $15 / 8{ }^{\prime \prime}$ Coax | 1.98 | 0.82 | N | 0.00 | $N$ | AT\&T Mobility |
| 8.00 | 150.00 | 2 | $15 / 8{ }^{\prime \prime}$ Coax | 1.98 | 0.82 | N | 0.00 | $N$ | Sprint Nextel |
| 8.00 | 150.00 | 2 | 3" Conduit | 3.50 | 7.58 | N | 0.00 | N | AT\&T Mobility |
| 8.00 | 141.00 | 6 | $15 / 8$ " Coax | 1.98 | 0.82 | N | 1.98 | Y | Metro PCS |
| 8.00 | 131.00 | 12 | 1 1/4" Coax | 1.55 | 0.63 | N | 1.55 | Y | Sprint Nextel |
| 8.00 | 131.00 | 4 | 1 1/4" Hybriflex Cable | 1.54 | 1.00 | N | 0.00 | Y | Sprint Nextel |
| 0.00 | 118.00 | 3 | Reinf. | 1.25 | 0.00 | Y | 0.00 | Y | -- |


| Site Number: 302494 | Code: ANSI/TIA-222-G | O 2007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | :---: | :---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number:OAA712589_C3_05 | $4 / 24 / 2018$ 5:53:14 PM |
| Customer: | SPRINT NEXTEL |  |  |

## Additional Steel

| Elev From (ft) | Elev <br> To <br> (ft) | Qty | Description |  | $\begin{gathered} \text { Fy } \\ (\mathrm{ksi}) \end{gathered}$ | Offset (in) | - Intermediate Connections- |  |  | Connectors | Continuation? |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Description |  | Spacing <br> (in) | Len <br> (in) |  |  |
| 0.00 | 36.67 | 3 | PL | PL $7 \times 1.25$ |  | 65 | 0.00 | 5/8" Hollo Bolt | 18.0 | 0.00 | 5/8" Hollo Bolt | No |
| 36.67 | 73.33 | 3 | PL | PL $6 \times 1.25$ | 65 | 0.00 | 5/8" Hollo Bolt | 18.0 | 0.00 | 5/8" Hollo Bolt | Yes |
| 73.33 | 110.0 | 3 | PL | PL 5" $\times 1.25^{\prime \prime}$ | 65 | 0.00 | 5/8" Hollo Bolt | 18.0 | 0.00 | 5/8" Hollo Bolt | Yes |
| 110.0 | 116.5 | 3 | PL | PL $4 \times 1.25$ | 65 | 0.00 | 5/8" Hollo Bolt | 18.0 | 3.00 | 5/8" Hollo Bolt | Yes |

Customer: SPRINT NEXTEL

Segment Properties (Max Len: 0.ft)

| Seg Top Elev (ft) | Description | Thick (in) | Flat Dia (in) | Area <br> (in ${ }^{2}$ ) | $\begin{gathered} 1 \mathrm{x} \\ \left(\mathrm{in}^{4}\right) \end{gathered}$ | W/t Ratio | $\begin{array}{cc} \text { D/t } & \mathrm{F}^{\prime} \mathrm{y} \\ \text { Ratio } & \text { (ksi) } \end{array}$ | $\underset{\left(\mathrm{in}^{3}\right)}{\mathrm{S}}$ | $\underset{\left(\mathrm{in}^{3}\right)}{\mathrm{Z}}$ | Weight (lb) | Additional Reinforcing |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |  |  |  |  |  | Area (in ${ }^{2}$ ) | $\begin{gathered} 1 \mathrm{x} \\ \left(\mathrm{in}^{4}\right) \\ \hline \end{gathered}$ | Weight (lb) |
| 0.00 |  | 0.3750 | 37.380 | 44.684 | 7,810.1 | 24.03 | 99.6878 .5 | 403.6 | 0.0 | 0.0 | 26.25 | 4,951 | 0.0 |
| 0.50 |  | 0.3750 | 37.302 | 44.589 | 7,760.6 | 23.97 | 99.4778 .6 | 401.9 | 0.0 | 75.9 | 26.25 | 4,932 | 44.6 |
| 1.00 |  | 0.3750 | 37.223 | 44.494 | 7,711.3 | 23.92 | 99.2678 .6 | 400.2 | 0.0 | 75.8 | 26.25 | 4.912 | 44.6 |
| 1.50 |  | 0.3750 | 37.145 | 44.400 | 7,662.2 | 23.86 | 99.0578 .7 | 398.5 | 0.0 | 75.6 | 26.25 | 4,892 | 44.6 |
| 2.00 |  | 0.3750 | 37.067 | 44.305 | 7,613.3 | 23.81 | 98.8478 .8 | 396.8 | 0.0 | 75.5 | 26.25 | 4,872 | 44.6 |
| 2.50 |  | 0.3750 | 36.988 | 44.210 | 7,564.6 | 23.75 | 98.6478 .8 | 395.1 | 0.0 | 75.3 | 26.25 | 4,853 | 44.6 |
| 3.00 |  | 0.3750 | 36.910 | 44.116 | 7,516.2 | 23.69 | 98.4378 .9 | 393.4 | 0.0 | 75.1 | 26.25 | 4,833 | 44.6 |
| 3.50 |  | 0.3750 | 36.832 | 44.021 | 7,467.9 | 23.64 | 98.2278 .9 | 391.7 | 0.0 | 75.0 | 26.25 | 4,813 | 44.6 |
| 4.00 |  | 0.3750 | 36.753 | 43.927 | 7,419.9 | 23.58 | 98.0179 .0 | 390.0 | 0.0 | 74.8 | 26.25 | 4,794 | 44.6 |
| 4.50 |  | 0.3750 | 36.675 | 43.832 | 7,372.0 | 23.53 | 97.8079 .1 | 388.3 | 0.0 | 74.7 | 26.25 | 4,774 | 44.6 |
| 5.00 |  | 0.3750 | 36.597 | 43.737 | 7,324.4 | 23.47 | 97.5979 .1 | 386.6 | 0.0 | 74.5 | 26.25 | 4,755 | 44.6 |
| 5.50 |  | 0.3750 | 36.518 | 43.643 | 7.277 .0 | 23.41 | 97.3879 .2 | 385.0 | 0.0 | 74.3 | 26.25 | 4,735 | 44.6 |
| 6.00 |  | 0.3750 | 36.440 | 43.548 | 7,229.8 | 23.36 | 97.1779 .2 | 383.3 | 0.0 | 74.2 | 26.25 | 4,716 | 44.6 |
| 6.50 |  | 0.3750 | 36.361 | 43.454 | 7,182.7 | 23.30 | 96.9679 .3 | 381.6 | 0.0 | 74.0 | 26.25 | 4,697 | 44.6 |
| 7.00 |  | 0.3750 | 36.283 | 43.359 | 7,135.9 | 23.25 | 96.7579 .4 | 379.9 | 0.0 | 73.9 | 26.25 | 4,677 | 44.6 |
| 7.50 |  | 0.3750 | 36.205 | 43.264 | 7,089.3 | 23.19 | 96.5579 .4 | 378.3 | 0.0 | 73.7 | 26.25 | 4,658 | 44.6 |
| 8.00 |  | 0.3750 | 36.126 | 43.170 | 7,042.9 | 23.13 | 96.3479 .5 | 376.6 | 0.0 | 73.5 | 26.25 | 4,639 | 44.6 |
| 8.50 |  | 0.3750 | 36.048 | 43.075 | 6,996.7 | 23.08 | 96.1379 .5 | 375.0 | 0.0 | 73.4 | 26.25 | 4,620 | 44.6 |
| 9.00 |  | 0.3750 | 35.970 | 42.981 | 6,950.7 | 23.02 | 95.9279 .6 | 373.3 | 0.0 | 73.2 | 26.25 | 4,600 | 44.6 |
| 9.50 |  | 0.3750 | 35.891 | 42.886 | 6,904.9 | 22.97 | 95.7179 .7 | 371.7 | 0.0 | 73.0 | 26.25 | 4,581 | 44.6 |
| 10.00 |  | 0.3750 | 35.813 | 42.791 | 6,859.3 | 22.91 | 95.5079 .7 | 370.0 | 0.0 | 72.9 | 26.25 | 4,562 | 44.6 |
| 10.50 |  | 0.3750 | 35.735 | 42.697 | 6,813.9 | 22.85 | 95.2979 .8 | 368.4 | 0.0 | 72.7 | 26.25 | 4,543 | 44.6 |
| 11.00 |  | 0.3750 | 35.656 | 42.602 | 6,768.7 | 22.80 | 95.0879 .9 | 366.7 | 0.0 | 72.6 | 26.25 | 4,524 | 44.6 |
| 11.50 |  | 0.3750 | 35.578 | 42.508 | 6,723.7 | 22.74 | 94.8779 .9 | 365.1 | 0.0 | 72.4 | 26.25 | 4,505 | 44.6 |
| 12.00 |  | 0.3750 | 35.500 | 42.413 | 6,678.9 | 22.69 | 94.6780 .0 | 363.5 | 0.0 | 72.2 | 26.25 | 4,486 | 44.6 |
| 12.50 |  | 0.3750 | 35.421 | 42.318 | 6,634.3 | 22.63 | 94.4680 .0 | 361.8 | 0.0 | 72.1 | 26.25 | 4,467 | 44.6 |
| 13.00 |  | 0.3750 | 35.343 | 42.224 | 6,589.9 | 22.57 | 94.2580 .1 | 360.2 | 0.0 | 71.9 | 26.25 | 4,449 | 44.6 |
| 13.50 |  | 0.3750 | 35.265 | 42.129 | 6,545.7 | 22.52 | 94.0480 .2 | 358.6 | 0.0 | 71.8 | 26.25 | 4,430 | 44.6 |
| 14.00 |  | 0.3750 | 35.186 | 42.035 | 6,501.7 | 22.46 | 93.8380 .2 | 357.0 | 0.0 | 71.6 | 26.25 | 4,411 | 44.6 |
| 14.50 |  | 0.3750 | 35.108 | 41.940 | 6,457.9 | 22.41 | 93.6280 .3 | 355.4 | 0.0 | 71.4 | 26.25 | 4,392 | 44.6 |
| 15.00 |  | 0.3750 | 35.029 | 41.845 | 6.414 .3 | 22.35 | 93.4180 .3 | 353.7 | 0.0 | 71.3 | 26.25 | 4,374 | 44.6 |
| 15.50 |  | 0.3750 | 34.951 | 41.751 | 6,370.9 | 22.29 | 93.2080 .4 | 352.1 | 0.0 | 71.1 | 26.25 | 4,355 | 44.6 |
| 16.00 |  | 0.3750 | 34.873 | 41.656 | 6,327.7 | 22.24 | 92.9980 .5 | 350.5 | 0.0 | 71.0 | 26.25 | 4,336 | 44.6 |
| 16.50 |  | 0.3750 | 34.794 | 41.561 | 6,284.7 | 22.18 | 92.7980 .5 | 348.9 | 0.0 | 70.8 | 26.25 | 4,318 | 44.6 |
| 17.00 |  | 0.3750 | 34.716 | 41.467 | 6,241.9 | 22.13 | 92.5880 .6 | 347.3 | 0.0 | 70.6 | 26.25 | 4,299 | 44.6 |
| 17.50 |  | 0.3750 | 34.638 | 41.372 | 6,199.3 | 22.07 | 92.3780 .6 | 345.8 | 0.0 | 70.5 | 26.25 | 4,281 | 44.6 |
| 18.00 |  | 0.3750 | 34.559 | 41.278 | 6,156.8 | 22.01 | 92.1680 .7 | 344.2 | 0.0 | 70.3 | 26.25 | 4,262 | 44.6 |
| 18.50 |  | 0.3750 | 34.481 | 41.183 | 6,114.6 | 21.96 | 91.9580 .8 | 342.6 | 0.0 | 70.1 | 26.25 | 4,244 | 44.6 |
| 19.00 |  | 0.3750 | 34.403 | 41.088 | 6,072.5 | 21.90 | 91.7480 .8 | 341.0 | 0.0 | 70.0 | 26.25 | 4,226 | 44.6 |
| 19.50 |  | 0.3750 | 34.324 | 40.994 | 6,030.7 | 21.85 | 91.5380 .9 | 339.4 | 0.0 | 69.8 | 26.25 | 4,207 | 44.6 |
| 20.00 |  | 0.3750 | 34.246 | 40.899 | 5,989.0 | 21.79 | 91.3280 .9 | 337.8 | 0.0 | 69.7 | 26.25 | 4,189 | 44.6 |
| 20.50 |  | 0.3750 | 34.168 | 40.805 | 5,947.6 | 21.73 | 91.1181 .0 | 336.3 | 0.0 | 69.5 | 26.25 | 4,171 | 44.6 |
| 21.00 |  | 0.3750 | 34.089 | 40.710 | 5,906.3 | 21.68 | 90.9081 .1 | 334.7 | 0.0 | 69.3 | 26.25 | 4,153 | 44.6 |
| 21.50 |  | 0.3750 | 34.011 | 40.615 | 5,865.2 | 21.62 | 90.7081 .1 | 333.1 | 0.0 | 69.2 | 26.25 | 4,135 | 44.6 |
| 22.00 |  | 0.3750 | 33.933 | 40.521 | 5,824.3 | 21.57 | 90.4981 .2 | 331.6 | 0.0 | 69.0 | 26.25 | 4,116 | 44.6 |
| 22.50 |  | 0.3750 | 33.854 | 40.426 | 5,783.6 | 21.51 | 90.2881 .3 | 330.0 | 0.0 | 68.9 | 26.25 | 4,098 | 44.6 |
| 23.00 |  | 0.3750 | 33.776 | 40.332 | 5,743.1 | 21.45 | 90.0781 .3 | 328.5 | 0.0 | 68.7 | 26.25 | 4,080 | 44.6 |
| 23.50 |  | 0.3750 | 33.698 | 40.237 | 5,702.8 | 21.40 | 89.8681 .4 | 326.9 | 0.0 | 68.5 | 26.25 | 4,062 | 44.6 |
| 24.00 |  | 0.3750 | 33.619 | 40.142 | 5,662.7 | 21.34 | 89.6581 .4 | 325.4 | 0.0 | 68.4 | 26.25 | 4,044 | 44.6 |
| 24.50 |  | 0.3750 | 33.541 | 40.048 | 5,622.7 | 21.29 | 89.4481 .5 | 323.9 | 0.0 | 68.2 | 26.25 | 4,026 | 44.6 |
| 25.00 |  | 0.3750 | 33.462 | 39.953 | 5,583.0 | 21.23 | 89.2381 .6 | 322.3 | 0.0 | 68.1 | 26.25 | 4,009 | 44.6 |
| 25.50 |  | 0.3750 | 33.384 | 39.859 | 5,543.4 | 21.17 | 89.0281 .6 | 320.8 | 0.0 | 67.9 | 26.25 | 3,991 | 44.6 |
| 26.00 |  | 0.3750 | 33.306 | 39.764 | 5,504.0 | 21.12 | 88.8281 .7 | 319.3 | 0.0 | 67.7 | 26.25 | 3,973 | 44.6 |
| 26.50 |  | 0.3750 | 33.227 | 39.669 | 5,464.8 | 21.06 | 88.6181 .7 | 317.7 | 0.0 | 67.6 | 26.25 | 3,955 | 44.6 |
| 27.00 |  | 0.3750 | 33.149 | 39.575 | 5,425.8 | 21.01 | 88.4081 .8 | 316.2 | 0.0 | 67.4 | 26.25 | 3,938 | 44.6 |
| 27.50 |  | 0.3750 | 33.071 | 39.480 | 5,387.0 | 20.95 | 88.1981 .9 | 314.7 | 0.0 | 67.3 | 26.25 | 3,920 | 44.6 |
| 28.00 |  | 0.3750 | 32.992 | 39.386 | 5,348.4 | 20.89 | 87.9881 .9 | 313.2 | 0.0 | 67.1 | 26.25 | 3,902 | 44.6 |
| 28.50 |  | 0.3750 | 32.914 | 39.291 | 5,309.9 | 20.84 | 87.7781 .9 | 311.7 | 0.0 | 66.9 | 26.25 | 3,885 | 44.6 |

Customer: SPRINT NEXTEL

| 29.00 |  | 0.3750 | 32.836 | 39.196 | 5,271.7 | 20.78 | 87.5681 .9 | 310.2 | 0.0 | 66.8 | 26.25 | 3,867 | 44.6 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 29.50 |  | 0.3750 | 32.757 | 39.102 | 5,233.6 | 20.73 | 87.3581 .9 | 308.6 | 0.0 | 66.6 | 26.25 | 3,850 | 44.6 |
| 30.00 |  | 0.3750 | 32.679 | 39.007 | 5,195.7 | 20.67 | 87.1481 .9 | 307.1 | 0.0 | 66.4 | 26.25 | 3,832 | 44.6 |
| 30.50 |  | 0.3750 | 32.601 | 38.912 | 5,158.0 | 20.61 | 86.9481 .9 | 305.7 | 0.0 | 66.3 | 26.25 | 3,815 | 44.6 |
| 31.00 |  | 0.3750 | 32.522 | 38.818 | 5,120.4 | 20.56 | 86.7381 .9 | 304.2 | 0.0 | 66.1 | 26.25 | 3,797 | 44.6 |
| 31.50 | Bot - Section 2 | 0.3750 | 32.444 | 38.723 | 5,083.1 | 20.50 | 86.5281 .9 | 302.7 | 0.0 | 66.0 | 26.25 | 3,780 | 44.6 |
| 32.00 |  | 0.3750 | 32.366 | 38.629 | 5,045.9 | 20.45 | 86.3181 .9 | 301.2 | 0.0 | 121.8 | 26.25 | 3,902 | 44.6 |
| 32.50 |  | 0.3750 | 32.287 | 38.534 | 5,008.9 | 20.39 | 86.1081 .9 | 299.7 | 0.0 | 121.5 | 26.25 | 3,884 | 44.6 |
| 33.00 |  | 0.3750 | 32.209 | 38.439 | 4,972.1 | 20.33 | 85.8981 .9 | 298.2 | 0.0 | 121.2 | 26.25 | 3,867 | 44.6 |
| 33.50 |  | 0.3750 | 32.131 | 38.345 | 4,935.5 | 20.28 | 85.6881 .9 | 296.7 | 0.0 | 120.9 | 26.25 | 3,849 | 44.6 |
| 34.00 |  | 0.3750 | 32.052 | 38.250 | 4,899.1 | 20.22 | 85.4781 .9 | 295.3 | 0.0 | 120.6 | 26.25 | 3,832 | 44.6 |
| 34.50 |  | 0.3750 | 31.974 | 38.156 | 4,862.8 | 20.17 | 85.2681 .9 | 293.8 | 0.0 | 120.3 | 26.25 | 3,814 | 44.6 |
| 35.00 |  | 0.3750 | 31.895 | 38.061 | 4,826.7 | 20.11 | 85.0581 .9 | 292.3 | 0.0 | 120.0 | 26.25 | 3,797 | 44.6 |
| 35.50 |  | 0.3750 | 31.817 | 37.966 | 4,790.8 | 20.05 | 84.8581 .9 | 290.9 | 0.0 | 119.7 | 26.25 | 3,780 | 44.6 |
| 35.67 | Top - Section 1 | 0.3125 | 32.416 | 32.304 | 4,249.6 | 25.12 | 103.7377 .3 | 253.3 | 0.0 | 39.8 | 26.25 | 3,774 | 14.9 |
| 36.00 |  | 0.3125 | 32.364 | 32.252 | 4,228.9 | 25.07 | 103.5677 .4 | 252.4 | 0.0 | 36.6 | 26.25 | 3,762 | 29.8 |
| 36.50 |  | 0.3125 | 32.285 | 32.173 | 4,198.0 | 25.00 | 103.3177 .4 | 251.2 | 0.0 | 54.8 | 26.25 | 3,745 | 44.6 |
| 36.67 | Reinf. Top Reinf | 0.3125 | 32.259 | 32.146 | 4,187.5 | 24.98 | 103.2377 .5 | 250.8 | 0.0 | 18.6 | 26.25 | 3,739 | 15.2 |
| 37.00 |  | 0.3125 | 32.207 | 32.094 | 4,167.2 | 24.94 | 103.0677 .5 | 250.0 | 0.0 | 36.1 | 22.50 | 3,183 | 25.2 |
| 37.50 |  | 0.3125 | 32.129 | 32.015 | 4,136.6 | 24.87 | 102.8177 .6 | 248.7 | 0.0 | 54.5 | 22.50 | 3,168 | 38.3 |
| 38.00 |  | 0.3125 | 32.050 | 31.936 | 4,106.1 | 24.80 | 102.5677 .7 | 247.5 | 0.0 | 54.4 | 22.50 | 3,154 | 38.3 |
| 38.50 |  | 0.3125 | 31.972 | 31.857 | 4,075.7 | 24.73 | 102.3177 .7 | 246.3 | 0.0 | 54.3 | 22.50 | 3,139 | 38.3 38.3 |
| 39.00 |  | 0.3125 | 31.894 | 31.779 | 4,045.6 | 24.67 | 102.0677 .8 | 245.0 | 0.0 | 54.1 | 22.50 | 3,124 | 38.3 |
| 39.50 |  | 0.3125 | 31.815 | 31.700 | 4,015.5 | 24.60 | 101.8177 .9 | 243.8 | 0.0 | 54.0 | 22.50 | 3,110 | 38.3 |
| 40.00 |  | 0.3125 | 31.737 | 31.621 | 3,985.6 | 24.53 | 101.5678 .0 | 242.6 | 0.0 | 53.9 | 22.50 | 3,095 | 38.3 |
| 40.50 |  | 0.3125 | 31.659 | 31.542 | 3,955.9 | 24.47 | 101.3178 .0 | 241.4 | 0.0 | 53.7 | 22.50 | 3,081 | 38.3 |
| 41.00 |  | 0.3125 | 31.580 | 31.463 | 3,926.3 | 24.40 | 101.0678 .1 | 240.2 | 0.0 | 53.6 | 22.50 | 3,066 | 38.3 |
| 41.50 |  | 0.3125 | 31.502 | 31.384 | 3,896.9 | 24.33 | 100.8178 .2 | 239.0 | 0.0 | 53.5 | 22.50 | 3,052 | 38.3 |
| 42.00 |  | 0.3125 | 31.424 | 31.306 | 3,867.6 | 24.26 | 100.5678 .3 | 237.8 | 0.0 | 53.3 | 22.50 | 3,037 | 38.3 |
| 42.50 |  | 0.3125 | 31.345 | 31.227 | 3,838.4 | 24.20 | 100.3078 .3 | 236.6 | 0.0 | 53.2 | 22.50 | 3,023 | 38.3 |
| 43.00 |  | 0.3125 | 31.267 | 31.148 | 3,809.4 | 24.13 | 100.0578 .4 | 235.4 | 0.0 | 53.1 | 22.50 | 3,009 | 38.3 |
| 43.50 |  | 0.3125 | 31.189 | 31.069 | 3,780.6 | 24.06 | 99.8078 .5 | 234.2 | 0.0 | 52.9 | 22.50 | 2,994 | 38.3 |
| 44.00 |  | 0.3125 | 31.110 | 30.990 | 3,751.9 | 24.00 | 99.5578 .5 | 233.0 | 0.0 | 52.8 | 22.50 | 2,980 | 38.3 |
| 44.50 |  | 0.3125 | 31.032 | 30.911 | 3,723.3 | 23.93 | 99.3078 .6 | 231.8 | 0.0 | 52.7 | 22.50 | 2,966 | 38.3 |
| 45.00 |  | 0.3125 | 30.953 | 30.833 | 3,694.9 | 23.86 | 99.0578 .7 | 230.6 | 0.0 | 52.5 | 22.50 | 2,952 | 38.3 |
| 45.50 |  | 0.3125 | 30.875 | 30.754 | 3,666.6 | 23.79 | 98.8078 .8 | 229.4 | 0.0 | 52.4 | 22.50 | 2,937 | 38.3 |
| 46.00 |  | 0.3125 | 30.797 | 30.675 | 3,638.5 | 23.73 | 98.5578 .8 | 228.2 | 0.0 | 52.3 | 22.50 | 2,923 | 38.3 |
| 46.50 |  | 0.3125 | 30.718 | 30.596 | 3,610.5 | 23.66 | 98.3078 .9 | 227.1 | 0.0 | 52.1 | 22.50 | 2,909 | 38.3 |
| 47.00 |  | 0.3125 | 30.640 | 30.517 | 3,582.7 | 23.59 | 98.0579 .0 | 225.9 | 0.0 | 52.0 | 22.50 | 2,895 | 38.3 |
| 47.50 |  | 0.3125 | 30.562 | 30.438 | 3,555.0 | 23.53 | 97.8079 .1 | 224.7 | 0.0 | 51.9 | 22.50 | 2,881 | 38.3 |
| 48.00 |  | 0.3125 | 30.483 | 30.359 | 3,527.4 | 23.46 | 97.5579 .1 | 223.5 | 0.0 | 51.7 | 22.50 | 2,867 | 38.3 |
| 48.50 |  | 0.3125 | 30.405 | 30.281 | 3,500.0 | 23.39 | 97.3079 .2 | 222.4 | 0.0 | 51.6 | 22.50 | 2,853 | 38.3 |
| 49.00 |  | 0.3125 | 30.327 | 30.202 | 3,472.7 | 23.32 | 97.0579 .3 | 221.2 | 0.0 | 51.5 | 22.50 | 2,839 | 38.3 |
| 49.50 |  | 0.3125 | 30.248 | 30.123 | 3,445.6 | 23.26 | 96.7979 .3 | 220.1 | 0.0 | 51.3 | 22.50 | 2,825 | 38.3 |
| 50.00 |  | 0.3125 | 30.170 | 30.044 | 3,418.6 | 23.19 | 96.5479 .4 | 218.9 | 0.0 | 51.2 | 22.50 | 2,811 | 38.3 |
| 50.50 |  | 0.3125 | 30.092 | 29.965 | 3,391.8 | 23.12 | 96.2979 .5 | 217.7 | 0.0 | 51.0 | 22.50 | 2,797 | 38.3 |
| 51.00 |  | 0.3125 | 30.013 | 29.886 | 3,365.1 | 23.06 | 96.0479 .6 | 216.6 | 0.0 | 50.9 | 22.50 | 2,784 | 38.3 |
| 51.50 |  | 0.3125 | 29.935 | 29.808 | 3,338.5 | 22.99 | 95.7979 .6 | 215.5 | 0.0 | 50.8 | 22.50 | 2,770 | 38.3 |
| 52.00 |  | 0.3125 | 29.857 | 29.729 | 3,312.1 | 22.92 | 95.5479 .7 | 214.3 | 0.0 | 50.6 | 22.50 | 2,756 | 38.3 |
| 52.50 |  | 0.3125 | 29.778 | 29.650 | 3,285.8 | 22.85 | 95.2979 .8 | 213.2 | 0.0 | 50.5 | 22.50 | 2,743 | 38.3 |
| 53.00 |  | 0.3125 | 29.700 | 29.571 | 3,259.7 | 22.79 | 95.0479 .9 | 212.0 | 0.0 | 50.4 | 22.50 | 2,729 | 38.3 |
| 53.50 |  | 0.3125 | 29.622 | 29.492 | 3,233.7 | 22.72 | 94.7979 .9 | 210.9 | 0.0 | 50.2 | 22.50 | 2,715 | 38.3 |
| 54.00 |  | 0.3125 | 29.543 | 29.413 | 3,207.8 | 22.65 | 94.5480 .0 | 209.8 | 0.0 | 50.1 | 22.50 | 2,702 | 38.3 |
| 54.50 |  | 0.3125 | 29.465 | 29.335 | 3,182.1 | 22.58 | 94.2980 .1 | 208.6 | 0.0 | 50.0 | 22.50 | 2,688 | 38.3 |
| 55.00 |  | 0.3125 | 29.386 | 29.256 | 3,156.5 | 22.52 | 94.0480 .2 | 207.5 | 0.0 | 49.8 | 22.50 | 2,675 | 38.3 |
| 55.50 |  | 0.3125 | 29.308 | 29.177 | 3,131.1 | 22.45 | 93.7980 .2 | 206.4 | 0.0 | 49.7 | 22.50 | 2,661 | 38.3 |
| 56.00 |  | 0.3125 | 29.230 | 29.098 | 3,105.7 | 22.38 | 93.5480 .3 | 205.3 | 0.0 | 49.6 | 22.50 | 2.648 | 38.3 |
| 56.50 |  | 0.3125 | 29.151 | 29.019 | 3,080.6 | 22.32 | 93.2880 .4 | 204.1 | 0.0 | 49.4 | 22.50 | 2,634 | 38.3 |
| 57.00 |  | 0.3125 | 29.073 | 28.940 | 3,055.5 | 22.25 | 93.0380 .4 | 203.0 | 0.0 | 49.3 | 22.50 | 2,621 | 38.3 |
| 57.50 |  | 0.3125 | 28.995 | 28.862 | 3,030.6 | 22.18 | 92.7880 .5 | 201.9 | 0.0 | 49.2 | 22.50 | 2,607 | 38.3 |
| 58.00 |  | 0.3125 | 28.916 | 28.783 | 3,005.9 | 22.11 | 92.5380 .6 | 200.8 | 0.0 | 49.0 | 22.50 | 2,594 | 38.3 |
| 58.50 |  | 0.3125 | 28.838 | 28.704 | 2,981.2 | 22.05 | 92.2880 .7 | 199.7 | 0.0 | 48.9 | 22.50 | 2,581 | 38.3 |
| 59.00 |  | 0.3125 | 28.760 | 28.625 | 2,956.7 | 21.98 | 92.0380 .7 | 198.6 | 0.0 | 48.8 | 22.50 | 2,568 | 38.3 |
| 59.50 |  | 0.3125 | 28.681 | 28.546 | 2,932.4 | 21.91 | 91.7880 .8 | 197.5 | 0.0 | 48.6 | 22.50 | 2,554 | 38.3 |

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:53:14 PM
Customer: SPRINT NEXTEL

| 60.00 |  | 0.3125 | 28.603 | 28.467 | 2,908.1 | 21.85 | 91.53 | 80.9 | 196.4 | 0.0 | 48.5 | 22.50 | 2,541 | 38.3 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 60.50 |  | 0.3125 | 28.525 | 28.388 | 2,884.0 | 21.78 | 91.28 | 81.0 | 195.3 | 0.0 | 48.4 | 22.50 | 2,528 | 38.3 |
| 61.00 |  | 0.3125 | 28.446 | 28.310 | 2,860.1 | 21.71 | 91.03 | 81.0 | 194.2 | 0.0 | 48.2 | 22.50 | 2,515 | 38.3 |
| 61.50 |  | 0.3125 | 28.368 | 28.231 | 2,836.2 | 21.64 | 90.78 | 81.1 | 193.1 | 0.0 | 48.1 | 22.50 | 2,502 | 38.3 |
| 62.00 |  | 0.3125 | 28.290 | 28.152 | 2,812.5 | 21.58 | 90.53 | 81.2 | 192.1 | 0.0 | 48.0 | 22.50 | 2,489 | 38.3 |
| 62.50 |  | 0.3125 | 28.211 | 28.073 | 2,789.0 | 21.51 | 90.28 | 81.3 | 191.0 | 0.0 | 47.8 | 22.50 | 2,476 | 38.3 |
| 63.00 |  | 0.3125 | 28.133 | 27.994 | 2,765.6 | 21.44 | 90.03 | 81.3 | 189.9 | 0.0 | 47.7 | 22.50 | 2,463 | 38.3 |
| 63.50 |  | 0.3125 | 28.055 | 27.915 | 2,742.3 | 21.38 | 89.77 | 81.4 | 188.8 | 0.0 | 47.6 | 22.50 | 2,450 | 38.3 |
| 64.00 |  | 0.3125 | 27.976 | 27.837 | 2,719.1 | 21.31 | 89.52 | 81.5 | 187.8 | 0.0 | 47.4 | 22.50 | 2,437 | 38.3 |
| 64.50 |  | 0.3125 | 27.898 | 27.758 | 2,696.0 | 21.24 | 89.27 | 81.5 | 186.7 | 0.0 | 47.3 | 22.50 | 2,424 | 38.3 |
| 65.00 |  | 0.3125 | 27.819 | 27.679 | 2,673.1 | 21.17 | 89.02 | 81.6 | 185.6 | 0.0 | 47.2 | 22.50 | 2,411 | 38.3 |
| 65.50 |  | 0.3125 | 27.741 | 27.600 | 2,650.4 | 21.11 | 88.77 | 81.7 | 184.6 | 0.0 | 47.0 | 22.50 | 2,399 | 38.3 |
| 66.00 |  | 0.3125 | 27.663 | 27.521 | 2,627.7 | 21.04 | 88.52 | 81.8 | 183.5 | 0.0 | 46.9 | 22.50 | 2,386 | 38.3 |
| 66.50 |  | 0.3125 | 27.584 | 27.442 | 2,605.2 | 20.97 | 88.27 | 81.8 | 182.5 | 0.0 | 46.8 | 22.50 | 2,373 | 38.3 |
| 67.00 |  | 0.3125 | 27.506 | 27.364 | 2,582.8 | 20.91 | 88.02 | 81.9 | 181.4 | 0.0 | 46.6 | 22.50 | 2,360 | 38.3 |
| 67.50 |  | 0.3125 | 27.428 | 27.285 | 2,560.5 | 20.84 | 87.77 | 81.9 | 180.3 | 0.0 | 46.5 | 22.50 | 2,348 | 38.3 |
| 68.00 |  | 0.3125 | 27.349 | 27.206 | 2,538.4 | 20.77 | 87.52 | 81.9 | 179.3 | 0.0 | 46.4 | 22.50 | 2,335 | 38.3 |
| 68.50 |  | 0.3125 | 27.271 | 27.127 | 2,516.4 | 20.70 | 87.27 | 81.9 | 178.3 | 0.0 | 46.2 | 22.50 | 2,323 | 38.3 |
| 69.00 |  | 0.3125 | 27.193 | 27.048 | 2,494.5 | 20.64 | 87.02 | 81.9 | 177.2 | 0.0 | 46.1 | 22.50 | 2,310 | 38.3 |
| 69.50 |  | 0.3125 | 27.114 | 26.969 | 2,472.8 | 20.57 | 86.77 | 81.9 | 176.2 | 0.0 | 46.0 | 22.50 | 2,298 | 38.3 |
| 70.00 | Bot - Section 3 | 0.3125 | 27.036 | 26.891 | 2,451.2 | 20.50 | 86.52 | 81.9 | 175.1 | 0.0 | 45.8 | 22.50 | 2,285 | 38.2 |
| 70.50 |  | 0.3125 | 26.958 | 26.812 | 2,429.7 | 20.44 | 86.26 | 81.9 | 174.1 | 0.0 | 83.0 | 22.50 | 2,353 | 38.3 |
| 71.00 |  | 0.3125 | 26.879 | 26.733 | 2,408.3 | 20.37 | 86.01 | 81.9 | 173.1 | 0.0 | 82.8 | 22.50 | 2,340 | 38.3 |
| 71.50 |  | 0.3125 | 26.801 | 26.654 | 2,387.0 | 20.30 | 85.76 | 81.9 | 172.1 | 0.0 | 82.5 | 22.50 | 2,327 | 38.3 |
| 72.00 |  | 0.3125 | 26.723 | 26.575 | 2,365.9 | 20.23 | 85.51 | 81.9 | 171.0 | 0.0 | 82.3 | 22.50 | 2,315 | 38.3 |
| 72.50 |  | 0.3125 | 26.644 | 26.496 | 2,344.9 | 20.17 | 85.26 | 81.9 | 170.0 | 0.0 | 82.0 | 22.50 | 2,302 | 38.3 |
| 73.00 |  | 0.3125 | 26.566 | 26.417 | 2,324.1 | 20.10 | 85.01 | 81.9 | 169.0 | 0.0 | 81.8 | 22.50 | 2,290 | 38.3 |
| 73.33 | Reinf. Top Reinf | 0.3125 | 26.514 | 26.365 | 2,310.4 | 20.05 | 84.85 | 81.9 | 168.3 | 0.0 | 53.9 | 22.50 | 2,282 | 25.2 |
| 73.50 | Top-Section 2 | 0.2500 | 26.988 | 21.524 | 1,964.0 | 26.25 | 107.95 | 76.1 | 140.6 | 0.0 | 27.7 | 18.75 | 1,889 | 10.9 |
| 74.00 |  | 0.2500 | 26.909 | 21.461 | 1,946.8 | 26.16 | 107.64 | 76.2 | 139.8 | 0.0 | 36.6 | 18.75 | 1,879 | 32.0 |
| 74.50 |  | 0.2500 | 26.831 | 21.398 | 1,929.7 | 26.08 | 107.32 | 76.3 | 138.9 | 0.0 | 36.5 | 18.75 | 1,868 | 31.9 |
| 75.00 |  | 0.2500 | 26.752 | 21.335 | 1,912.7 | 25.99 | 107.01 | 76.4 | 138.1 | 0.0 | 36.4 | 18.75 | 1,858 | 31.9 |
| 75.50 |  | 0.2500 | 26.674 | 21.271 | 1,895.8 | 25.91 | 106.70 | 76.5 | 137.3 | 0.0 | 36.2 | 18.75 | 1,848 | 31.9 |
| 76.00 |  | 0.2500 | 26.596 | 21.208 | 1,879.0 | 25.83 | 106.38 | 76.5 | 136.5 | 0.0 | 36.1 | 18.75 | 1,838 | 31.9 |
| 76.50 |  | 0.2500 | 26.517 | 21.145 | 1,862.2 | 25.74 | 106.07 | 76.6 | 135.7 | 0.0 | 36.0 | 18.75 | 1,827 | 31.9 |
| 77.00 |  | 0.2500 | 26.439 | 21.082 | 1,845.6 | 25.66 | 105.76 | 76.7 | 134.9 | 0.0 | 35.9 | 18.75 | 1,817 | 31.9 |
| 77.50 |  | 0.2500 | 26.361 | 21.019 | 1,829.1 | 25.57 | 105.44 | 76.8 | 134.0 | 0.0 | 35.8 | 18.75 | 1,807 | 31.9 |
| 78.00 |  | 0.2500 | 26.282 | 20.956 | 1,812.7 | 25.49 | 105.13 | 76.9 | 133.2 | 0.0 | 35.7 | 18.75 | 1,797 | 31.9 |
| 78.50 |  | 0.2500 | 26.204 | 20.893 | 1,796.4 | 25.41 | 104.82 | 77.0 | 132.4 | 0.0 | 35.6 | 18.75 | 1,787 | 31.9 |
| 79.00 |  | 0.2500 | 26.126 | 20.830 | 1,780.2 | 25.32 | 104.50 | 77.1 | 131.6 | 0.0 | 35.5 | 18.75 | 1,777 | 31.9 |
| 79.50 |  | 0.2500 | 26.047 | 20.767 | 1,764.0 | 25.24 | 104.19 | 77.2 | 130.8 | 0.0 | 35.4 | 18.75 | 1,767 | 31.9 |
| 80.00 |  | 0.2500 | 25.969 | 20.704 | 1,748.0 | 25.15 | 103.88 | 77.3 | 130.0 | 0.0 | 35.3 | 18.75 | 1,757 | 31.9 |
| 80.50 |  | 0.2500 | 25.891 | 20.641 | 1,732.1 | 25.07 | 103.56 | 77.4 | 129.2 | 0.0 | 35.2 | 18.75 | 1,747 | 31.9 |
| 81.00 |  | 0.2500 | 25.812 | 20.578 | 1,716.3 | 24.99 | 103.25 | 77.5 | 128.4 | 0.0 | 35.1 | 18.75 | 1,737 | 31.9 |
| 81.50 |  | 0.2500 | 25.734 | 20.515 | 1,700.5 | 24.90 | 102.94 | 77.6 | 127.7 | 0.0 | 35.0 | 18.75 | 1,727 | 31.9 |
| 82.00 |  | 0.2500 | 25.656 | 20.452 | 1,684.9 | 24.82 | 102.62 | 77.6 | 126.9 | 0.0 | 34.8 | 18.75 | 1,717 | 31.9 |
| 82.50 |  | 0.2500 | 25.577 | 20.388 | 1,669.3 | 24.73 | 102.31 | 77.7 | 126.1 | 0.0 | 34.7 | 18.75 | 1,707 | 31.9 |
| 83.00 |  | 0.2500 | 25.499 | 20.325 | 1,653.9 | 24.65 | 102.00 | 77.8 | 125.3 | 0.0 | 34.6 | 18.75 | 1,697 | 31.9 |
| 83.50 |  | 0.2500 | 25.421 | 20.262 | 1,638.5 | 24.57 | 101.68 | 77.9 | 124.5 | 0.0 | 34.5 | 18.75 | 1,687 | 31.9 |
| 84.00 |  | 0.2500 | 25.342 | 20.199 | 1,623.3 | 24.48 | 101.37 | 78.0 | 123.7 | 0.0 | 34.4 | 18.75 | 1,678 | 31.9 |
| 84.50 |  | 0.2500 | 25.264 | 20.136 | 1,608.1 | 24.40 | 101.06 | 78.1 | 123.0 | 0.0 | 34.3 | 18.75 | 1,668 | 31.9 |
| 85.00 |  | 0.2500 | 25.185 | 20.073 | 1,593.1 | 24.31 | 100.74 | 78.2 | 122.2 | 0.0 | 34.2 | 18.75 | 1,658 | 31.9 |
| 85.50 |  | 0.2500 | 25.107 | 20.010 | 1,578.1 | 24.23 | 100.43 | 78.3 | 121.4 | 0.0 | 34.1 | 18.75 | 1,648 | 31.9 |
| 86.00 |  | 0.2500 | 25.029 | 19.947 | 1,563.2 | 24.15 | 100.12 | 78.4 | 120.7 | 0.0 | 34.0 | 18.75 | 1,639 | 31.9 |
| 86.50 |  | 0.2500 | 24.950 | 19.884 | 1,548.4 | 24.06 | 99.80 | 78.5 | 119.9 | 0.0 | 33.9 | 18.75 | 1,629 | 31.9 |
| 87.00 |  | 0.2500 | 24.872 | 19.821 | 1,533.8 | 23.98 | 99.49 | 78.6 | 119.1 | 0.0 | 33.8 | 18.75 | 1,620 | 31.9 |
| 87.50 |  | 0.2500 | 24.794 | 19.758 | 1,519.2 | 23.89 | 99.17 | 78.7 | 118.4 | 0.0 | 33.7 | 18.75 | 1,610 | 31.9 |
| 88.00 |  | 0.2500 | 24.715 | 19.695 | 1,504.7 | 23.81 | 98.86 | 78.7 | 117.6 | 0.0 | 33.6 | 18.75 | 1,600 | 31.9 |
| 88.50 |  | 0.2500 | 24.637 | 19.632 | 1,490.3 | 23.73 | 98.55 | 78.8 | 116.9 | 0.0 | 33.5 | 18.75 | 1,591 | 31.9 |
| 89.00 |  | 0.2500 | 24.559 | 19.568 | $1,475.9$ | 23.64 | 98.23 | 78.9 | 116.1 | 0.0 | 33.3 | 18.75 | 1,581 | 31.9 |
| 89.50 |  | 0.2500 | 24.480 | 19.505 | 1,461.7 | 23.56 | 97.92 | 79.0 | 115.3 | 0.0 | 33.2 | 18.75 | 1,572 | 31.9 |
| 90.00 |  | 0.2500 | 24.402 | 19.442 | 1,447.6 | 23.47 | 97.61 | 79.1 | 114.6 | 0.0 | 33.1 | 18.75 | 1,563 | 31.9 |
| 90.50 |  | 0.2500 | 24.324 | 19.379 | 1,433.5 | 23.39 | 97.29 | 79.2 | 113.9 | 0.0 | 33.0 | 18.75 | 1,553 | 31.9 |
| 91.00 |  | 0.2500 | 24.245 | 19.316 | 1,419.6 | 23.31 | 96.98 | 79.3 | 113.1 | 0.0 | 32.9 | 18.75 | 1,544 | 31.9 |

Site Number: 302494

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:53:14 PM
Customer: SPRINT NEXTEL

| 91.50 |  | 0.2500 | 24.167 | 19.253 | 1,405.7 | 23.22 | 96.67 | 79.4 | 112.4 | 0.0 | 32.8 | 18.75 | 1,534 | 31.9 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 92.00 |  | 0.2500 | 24.089 | 19.190 | 1,392.0 | 23.14 | 96.35 | 79.5 | 111.6 | 0.0 | 32.7 | 18.75 | 1,525 | 31.9 |
| 92.50 |  | 0.2500 | 24.010 | 19.127 | 1,378.3 | 23.05 | 96.04 | 79.6 | 110.9 | 0.0 | 32.6 | 18.75 | 1,516 | 31.9 |
| 93.00 |  | 0.2500 | 23.932 | 19.064 | 1,364.7 | 22.97 | 95.73 | 79.7 | 110.2 | 0.0 | 32.5 | 18.75 | 1,507 | 31.9 |
| 93.50 |  | 0.2500 | 23.854 | 19.001 | 1,351.2 | 22.89 | 95.41 | 79.8 | 109.4 | 0.0 | 32.4 | 18.75 | 1,497 | 31.9 |
| 94.00 |  | 0.2500 | 23.775 | 18.938 | 1,337.8 | 22.80 | 95.10 | 79.8 | 108.7 | 0.0 | 32.3 | 18.75 | 1,488 | 31.9 |
| 94.50 |  | 0.2500 | 23.697 | 18.875 | 1,324.4 | 22.72 | 94.79 | 79.9 | 108.0 | 0.0 | 32.2 | 18.75 | 1,479 | 31.9 |
| 95.00 |  | 0.2500 | 23.618 | 18.812 | 1,311.2 | 22.63 | 94.47 | 80.0 | 107.2 | 0.0 | 32.1 | 18.75 | 1,470 | 31.9 |
| 95.50 |  | 0.2500 | 23.540 | 18.749 | 1,298.1 | 22.55 | 94.16 | 80.1 | 106.5 | 0.0 | 32.0 | 18.75 | 1,461 | 31.9 |
| 96.00 |  | 0.2500 | 23.462 | 18.685 | 1,285.0 | 22.47 | 93.85 | 80.2 | 105.8 | 0.0 | 31.8 | 18.75 | 1,452 | 31.9 |
| 96.50 |  | 0.2500 | 23.383 | 18.622 | 1,272.0 | 22.38 | 93.53 | 80.3 | 105.1 | 0.0 | 31.7 | 18.75 | 1,442 | 31.9 |
| 97.00 |  | 0.2500 | 23.305 | 18.559 | 1,259.2 | 22.30 | 93.22 | 80.4 | 104.4 | 0.0 | 31.6 | 18.75 | 1,433 | 31.9 |
| 97.50 |  | 0.2500 | 23.227 | 18.496 | 1,246.4 | 22.21 | 92.91 | 80.5 | 103.7 | 0.0 | 31.5 | 18.75 | 1,424 | 31.9 |
| 98.00 |  | 0.2500 | 23.148 | 18.433 | 1,233.7 | 22.13 | 92.59 | 80.6 | 103.0 | 0.0 | 31.4 | 18.75 | 1,415 | 31.9 |
| 98.50 |  | 0.2500 | 23.070 | 18.370 | 1,221.0 | 22.05 | 92.28 | 80.7 | 102.2 | 0.0 | 31.3 | 18.75 | 1,407 | 31.9 |
| 99.00 |  | 0.2500 | 22.992 | 18.307 | 1,208.5 | 21.96 | 91.97 | 80.8 | 101.5 | 0.0 | 31.2 | 18.75 | 1,398 | 31.9 |
| 99.50 |  | 0.2500 | 22.913 | 18.244 | 1,196.1 | 21.88 | 91.65 | 80.9 | 100.8 | 0.0 | 31.1 | 18.75 | 1,389 | 31.9 |
| 100.0 |  | 0.2500 | 22.835 | 18.181 | 1,183.7 | 21.79 | 91.34 | 80.9 | 100.1 | 0.0 | 31.0 | 18.75 | 1,380 | 31.9 |
| 100.5 |  | 0.2500 | 22.757 | 18.118 | 1,171.4 | 21.71 | 91.03 | 81.0 | 99.4 | 0.0 | 30.9 | 18.75 | 1,371 | 31.9 |
| 101.0 |  | 0.2500 | 22.678 | 18.055 | 1,159.2 | 21.63 | 90.71 |  | 98.7 | 0.0 | 30.8 | 18.75 | 1,362 | 31.9 |
| 101.5 |  | 0.2500 | 22.600 | 17.992 | 1,147.1 | 21.54 | 90.40 | 81.2 | 98.1 | 0.0 | 30.7 | 18.75 | 1,353 | 31.9 |
| 102.0 |  | 0.2500 | 22.522 | 17.929 | 1,135.1 | 21.46 | 90.09 | 81.3 | 97.4 | 0.0 | 30.6 | 18.75 | 1,345 | 31.9 |
| 102.5 |  | 0.2500 | 22.443 | 17.866 | 1,123.2 | 21.38 | 89.77 | 81.4 | 96.7 | 0.0 | 30.4 | 18.75 | 1,336 | 31.9 |
| 103.0 |  | 0.2500 | 22.365 | 17.802 | 1,111.3 | 21.29 | 89.46 | 81.5 | 96.0 | 0.0 | 30.3 | 18.75 | 1,327 | 31.9 |
| 103.5 |  | 0.2500 | 22.287 | 17.739 | 1,099.5 | 21.21 | 89.15 | 81.6 | 95.3 | 0.0 | 30.2 | 18.75 | 1,319 | 31.9 |
| 104.0 |  | 0.2500 | 22.208 | 17.676 | 1,087.9 | 21.12 | 88.83 | 81.7 | 94.6 | 0.0 | 30.1 | 18.75 | 1,310 | 31.9 |
| 104.5 |  | 0.2500 | 22.130 | 17.613 | 1,076.3 | 21.04 | 88.52 | 81.8 | 94.0 | 0.0 | 30.0 | 18.75 | 1,301 | 31.9 |
| 105.0 |  | 0.2500 | 22.051 | 17.550 | 1,064.7 | 20.96 | 88.21 | 81.9 | 93.3 | 0.0 | 29.9 | 18.75 | 1,293 | 31.9 |
| 105.5 |  | 0.2500 | 21.973 | 17.487 | 1,053.3 | 20.87 | 87.89 | 81.9 | 92.6 | 0.0 | 29.8 | 18.75 | 1,284 | 31.9 |
| 106.0 |  | 0.2500 | 21.895 | 17.424 | 1,041.9 | 20.79 | 87.58 | 81.9 | 91.9 | 0.0 | 29.7 | 18.75 | 1,276 | 31.9 |
| 106.5 |  | 0.2500 | 21.816 | 17.361 | 1,030.7 | 20.70 | 87.27 | 81.9 | 91.3 | 0.0 | 29.6 | 18.75 | 1,267 | 31.9 |
| 107.0 |  | 0.2500 | 21.738 | 17.298 | 1,019.5 | 20.62 | 86.95 | 81.9 | 90.6 | 0.0 | 29.5 | 18.75 | 1,259 | 31.9 |
| 107.5 |  | 0.2500 | 21.660 | 17.235 | 1,008.4 | 20.54 | 86.64 | 81.9 | 89.9 | 0.0 | 29.4 | 18.75 | 1,250 | 31.9 |
| 108.0 |  | 0.2500 | 21.581 | 17.172 | 997.3 | 20.45 | 86.33 | 81.9 | 89.3 | 0.0 | 29.3 | 18.75 | 1,242 | 31.9 |
| 108.5 |  | 0.2500 | 21.503 | 17.109 | 986.4 | 20.37 | 86.01 | 81.9 | 88.6 | 0.0 | 29.2 | 18.75 | 1,234 | 31.9 |
| 109.0 |  | 0.2500 | 21.425 | 17.046 | 975.5 | 20.28 | 85.70 | 81.9 | 88.0 | 0.0 | 29.1 | 18.75 | 1,225 | 31.9 |
| 109.5 |  | 0.2500 | 21.346 | 16.983 | 964.7 | 20.20 | 85.39 | 81.9 | 87.3 | 0.0 | 28.9 | 18.75 | 1,217 | 31.9 |
| 110.0 | Top - Section 3 | 0.2500 | 21.268 | 16.919 | 954.0 | 20.12 | 85.07 | 81.9 | 86.7 | 0.0 | 28.8 | 18.75 | 1,209 | 31.9 |
| 110.0 | Bot-Section 4 | 0.1875 | 21.268 | 12.727 | 721.9 | 27.71 | 113.43 | 74.5 | 65.6 | 0.0 |  | 15.00 | 961.7 |  |
| 110.5 |  | 0.1875 | 21.190 | 12.680 | 713.9 | 27.60 | 113.01 | 74.6 | 65.1 | 0.0 | 21.6 | 15.00 | 955.1 | 25.5 |
| 111.0 |  | 0.1875 | 21.111 | 12.633 | 705.9 | 27.49 | 112.59 | 74.7 | 64.6 | 0.0 | 21.5 | 15.00 | 948.5 | 25.5 |
| 111.5 |  | 0.1875 | 21.033 | 12.585 | 698.0 | 27.38 | 112.18 | 74.9 | 64.1 | 0.0 | 21.5 | 15.00 | 942.0 | 25.5 |
| 112.0 |  | 0.1875 | 20.955 | 12.538 | 690.2 | 27.27 | 111.76 | 75.0 | 63.6 | 0.0 | 21.4 | 15.00 | 935.4 | 25.5 |
| 112.5 |  | 0.1875 | 20.876 | 12.491 | 682.4 | 27.15 | 111.34 | 75.1 | 63.1 | 0.0 | 21.3 | 15.00 | 928.9 | 25.5 |
| 113.0 |  | 0.1875 | 20.798 | 12.444 | 674.7 | 27.04 | 110.92 | 75.2 | 62.7 | 0.0 | 21.2 | 15.00 | 922.4 | 25.5 |
| 113.5 |  | 0.1875 | 20.720 | 12.396 | 667.0 | 26.93 | 110.50 | 75.3 | 62.2 | 0.0 | 21.1 | 15.00 | 916.0 | 25.5 |
| 114.0 |  | 0.1875 | 20.641 | 12.349 | 659.4 | 26.82 | 110.09 | 75.5 | 61.7 | 0.0 | 21.1 | 15.00 | 909.5 | 25.5 |
| 114.5 |  | 0.1875 | 20.563 | 12.302 | 651.9 | 26.71 | 109.67 | 75.6 | 61.2 | 0.0 | 21.0 | 15.00 | 903.1 | 25.5 |
| 115.0 |  | 0.1875 | 20.484 | 12.254 | 644.4 | 26.59 | 109.25 | 75.7 | 60.8 | 0.0 | 20.9 | 15.00 | 896.7 | 25.5 |
| 115.5 |  | 0.1875 | 20.406 | 12.207 | 636.9 | 26.48 | 108.83 | 75.8 | 60.3 | 0.0 | 20.8 | 15.00 | 890.3 | 25.5 |
| 116.0 |  | 0.1875 | 20.328 | 12.160 | 629.6 | 26.37 | 108.41 | 76.0 | 59.8 | 0.0 | 20.7 | 15.00 | 884.0 | 25.5 |
| 116.5 | Reinf. Top | 0.1875 | 20.249 | 12.112 | 622.2 | 26.26 | 108.00 | 76.1 | 59.4 | 0.0 | 20.6 | 15.00 | 877.7 | 25.5 |
| 117.0 |  | 0.1875 | 20.171 | 12.065 | 615.0 | 26.15 | 107.58 | 76.2 | 58.9 | 0.0 | 20.6 |  |  |  |
| 117.5 |  | 0.1875 | 20.093 | 12.018 | 607.8 | 26.03 | 107.16 | 76.3 | 58.4 | 0.0 | 20.5 |  |  |  |
| 118.0 |  | 0.1875 | 20.014 | 11.970 | 600.6 | 25.92 | 106.74 | 76.4 | 58.0 | 0.0 | 20.4 |  |  |  |
| 118.5 |  | 0.1875 | 19.936 | 11.923 | 593.5 | 25.81 | 106.33 | 76.6 | 57.5 | 0.0 | 20.3 |  |  |  |
| 119.0 |  | 0.1875 | 19.858 | 11.876 | 586.5 | 25.70 | 105.91 | 76.7 | 57.1 | 0.0 | 20.2 |  |  |  |
| 119.5 |  | 0.1875 | 19.779 | 11.829 | 579.5 | 25.59 | 105.49 | 76.8 | 56.6 | 0.0 | 20.2 |  |  |  |
| 120.0 |  | 0.1875 | 19.701 | 11.781 | 572.6 | 25.47 | 105.07 | 76.9 | 56.1 | 0.0 | 20.1 |  |  |  |
| 120.5 |  | 0.1875 | 19.623 | 11.734 | 565.7 | 25.36 | 104.65 | 77.1 | 55.7 | 0.0 | 20.0 |  |  |  |
| 121.0 |  | 0.1875 | 19.544 | 11.687 | 558.9 | 25.25 | 104.24 | 77.2 | 55.2 | 0.0 | 19.9 |  |  |  |
| 121.5 |  | 0.1875 | 19.466 | 11.639 | 552.2 | 25.14 | 103.82 | 77.3 | 54.8 | 0.0 | 19.8 |  |  |  |
| 122.0 |  | 0.1875 | 19.388 | 11.592 | 545.4 | 25.03 | 103.40 |  | 54.4 | 0.0 | 19.8 |  |  |  |
| 122.5 |  | 0.1875 | 19.309 | 11.545 | 538.8 | 24.91 | 102.98 | 77.5 | 53.9 | 0.0 | 19.7 |  |  |  |


| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 |

Customer: SPRINT NEXTEL



## Applied Segment Forces Summary

|  |  | Shaft Forces |  | Discrete Forces |  |  |  | Linear Forces |  | Sum of Forces |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Seg Elev <br> (ft) | Description | Wind FX <br> (b) | Dead Load (lb) | Wind FX <br> (Ib) | Torsion MY ( $\mathrm{lb}-\mathrm{ft}$ ) | $\begin{aligned} & \text { Moment } \\ & \text { MZ } \\ & \text { (lb-ft) } \end{aligned}$ | Dead Load (lb) | Wind FX <br> (b) | Dead <br> Load <br> (lb) | Wind FX <br> ( lb ) | Dead <br> Load <br> (Ib) | Torsion MY ( $\mathrm{lb}-\mathrm{ft}$ ) | Moment MZ <br> (lb) |
| 0.00 |  | 24.6 | 0.0 |  |  |  |  | 0.0 | 0.0 | 24.6 | 0.0 | 0.0 | 0.0 |
| 0.50 |  | 49.2 | 91.1 |  |  |  |  | 0.0 | 53.6 | 49.2 | 144.7 | 0.0 | 0.0 |
| 1.00 |  | 49.1 | 90.9 |  |  |  |  | 0.0 | 53.6 | 49.1 | 144.5 | 0.0 | 0.0 |
| 1.50 |  | 49.0 | 90.7 |  |  |  |  | 0.0 | 53.6 | 49.0 | 144.3 | 0.0 | 0.0 |
| 2.00 |  | 48.9 | 90.6 |  |  |  |  | 0.0 | 53.6 | 48.9 | 144.1 | 0.0 | 0.0 |
| 2.50 |  | 48.8 | 90.4 |  |  |  |  | 0.0 | 53.6 | 48.8 | 143.9 | 0.0 | 0.0 |
| 3.00 |  | 48.7 | 90.2 |  |  |  |  | 0.0 | 53.6 | 48.7 | 143.7 | 0.0 | 0.0 |
| 3.50 |  | 48.6 | 90.0 |  |  |  |  | 0.0 | 53.6 | 48.6 | 143.5 | 0.0 | 0.0 |
| 4.00 |  | 48.5 | 89.8 |  |  |  |  | 0.0 | 53.6 | 48.5 | 143.3 | 0.0 | 0.0 |
| 4.50 |  | 48.4 | 89.6 |  |  |  |  | 0.0 | 53.6 | 48.4 | 143.1 | 0.0 | 0.0 |
| 5.00 |  | 48.3 | 89.4 |  |  |  |  | 0.0 | 53.6 | 48.3 | 142.9 | 0.0 | 0.0 |
| 5.50 |  | 48.1 | 89.2 |  |  |  |  | 0.0 | 53.6 | 48.1 | 142.8 | 0.0 | 0.0 |
| 6.00 |  | 48.0 | 89.0 |  |  |  |  | 0.0 | 53.6 | 48.0 | 142.6 | 0.0 | 0.0 |
| 6.50 |  | 47.9 | 88.8 |  |  |  |  | 0.0 | 53.6 | 47.9 | 142.4 | 0.0 | 0.0 |
| 7.00 |  | 47.8 | 88.6 |  |  |  |  | 0.0 | 53.6 | 47.8 | 142.2 | 0.0 | 0.0 |
| 7.50 |  | 47.7 | 88.4 |  |  |  |  | 0.0 | 53.6 | 47.7 | 142.0 | 0.0 | 0.0 |
| 8.00 8.50 |  | 47.6 | 88.2 |  |  |  |  | 0.0 | 53.6 | 47.6 | 141.8 | 0.0 | 0.0 |
| 8.00 |  | 47.5 47.4 | 88.0 |  |  |  |  | 0.0 | 80.9 | 47.5 | 169.0 | 0.0 | 0.0 |
| 9.50 |  | 47.3 | 87.7 |  |  |  |  | 0.0 | 80.9 | 47.3 | 168.6 | 0.0 | 0.0 |
| 10.00 |  | 47.2 | 87.5 |  |  |  |  | 0.0 | 80.9 | 47.2 | 168.4 | 0.0 | 0.0 |
| 10.50 |  | 47.1 | 87.3 |  |  |  |  | 0.0 | 80.9 | 47.1 | 168.2 | 0.0 | 0.0 |
| 11.00 |  | 47.0 | 87.1 |  |  |  |  | 0.0 | 80.9 | 47.0 | 168.0 | 0.0 | 0.0 |
| 11.50 |  | 46.9 | 86.9 |  |  |  |  | 0.0 | 80.9 | 46.9 | 167.8 | 0.0 | 0.0 |
| 12.00 |  | 46.8 | 86.7 |  |  |  |  | 0.0 | 80.9 | 46.8 | 167.6 | 0.0 | 0.0 |
| 12.50 |  | 46.7 | 86.5 |  |  |  |  | 0.0 | 80.9 | 46.7 | 167.4 | 0.0 | 0.0 |
| 13.00 |  | 46.6 | 86.3 |  |  |  |  | 0.0 | 80.9 | 46.6 | 167.2 | 0.0 | 0.0 |
| 13.50 |  | 46.5 | 86.1 |  |  |  |  | 0.0 | 80.9 | 46.5 | 167.0 | 0.0 | 0.0 |
| 14.00 14.50 |  | 46.4 | 85.9 |  |  |  |  | 0.0 | 80.9 | 46.4 | 166.8 | 0.0 | 0.0 |
| 14.50 15.00 |  | 46.3 46.2 | 85.7 85.5 |  |  |  |  | 0.0 | 80.9 | 46.3 | 166.6 | 0.0 | 0.0 |
| 15.50 |  | 46.1 | 85.3 |  |  |  |  | 0.0 | 80.9 | 46.2 | 166.4 166.2 | 0.0 0.0 | 0.0 0.0 |
| 16.00 |  | 46.0 | 85.1 |  |  |  |  | 0.0 | 80.9 | 46.0 | 166.1 | 0.0 | 0.0 |
| 16.50 |  | 45.9 | 85.0 |  |  |  |  | 0.0 | 80.9 | 45.9 | 165.9 | 0.0 | 0.0 |
| 17.00 |  | 45.8 | 84.8 |  |  |  |  | 0.0 | 80.9 | 45.8 | 165.7 | 0.0 | 0.0 |
| 17.50 |  | 45.7 | 84.6 |  |  |  |  | 0.0 | 80.9 | 45.7 | 165.5 | 0.0 | 0.0 |
| 18.00 |  | 45.6 | 84.4 |  |  |  |  | 0.0 | 80.9 | 45.6 | 165.3 | 0.0 | 0.0 |
| 18.50 |  | 45.5 | 84.2 |  |  |  |  | 0.0 | 80.9 | 45.5 | 165.1 | 0.0 | 0.0 |
| 19.00 |  | 45.4 | 84.0 |  |  |  |  | 0.0 | 80.9 | 45.4 | 164.9 | 0.0 | 0.0 |
| 19.50 |  | 45.3 | 83.8 |  |  |  |  | 0.0 | 80.9 | 45.3 | 164.7 | 0.0 | 0.0 |
| 20.00 |  | 45.2 | 83.6 |  |  |  |  | 0.0 | 80.9 | 45.2 | 164.5 | 0.0 | 0.0 |
| 20.50 21.00 |  | 45.0 | 83.4 |  |  |  |  | 0.0 | 80.9 | 45.0 | 164.3 | 0.0 | 0.0 |
| 21.50 |  | 44.9 44.9 | 83.2 |  |  |  |  | 0.0 0.0 | 80.9 | 44.9 | 164.1 | 0.0 | 0.0 |
| 22.00 |  | 44.8 | 82.8 |  |  |  |  | 0.0 | 80.9 | 44.9 44.8 | 163.9 163.7 | 0.0 0.0 | 0.0 0.0 |
| 22.50 |  | 44.7 | 82.6 |  |  |  |  | 0.0 | 80.9 | 44.7 | 163.5 | 0.0 | 0.0 |
| 23.00 |  | 44.7 | 82.4 |  |  |  |  | 0.0 | 80.9 | 44.7 | 163.3 | 0.0 | 0.0 |
| 23.50 |  | 44.6 | 82.2 |  |  |  |  | 0.0 | 80.9 | 44.6 | 163.2 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 |

Customer: SPRINT NEXTEL


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| Site Number: | 302494 | Code: ANSI/TIA-222-G | c्p007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589 C3 05 | $4 / 24 / 2018$ | $5: 53: 34$ PM |

Customer: SPRINT NEXTEL


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| Site Number: | 302494 |  |  |  |
| :--- | :--- | ---: | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |  |
| Customer: | SPRINT NEXTEL |  |  |  |



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| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $1.2 \mathrm{D}+1.6 \mathrm{~W}$ |  |  | 101 mph with No Ice |  |  |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 <br> Dead Load Factor: 1.20 <br> Wind Load Factor : 1.60 |  |  |  |  |  |  |  |  |  | Wind Importance Factor : 1.00 |  |  |  |
| 108.00 |  | 48.2 | 35.1 |  |  |  |  | 0.0 | 65.7 | 48.2 | 100.8 | 0.0 | 0.0 |
| 108.50 |  | 48.2 | 35.0 |  |  |  |  | 0.0 | 65.7 | 48.2 | 100.7 | 0.0 | 0.0 |
| 109.00 |  | 48.1 | 34.9 |  |  |  |  | 0.0 | 65.7 | 48.1 | 100.6 | 0.0 | 0.0 |
| 109.50 |  | 48.1 | 34.7 |  |  |  |  | 0.0 | 65.7 | 48.1 | 100.4 | 0.0 | 0.0 |
| 110.00 | Top - Section 3 | 48.0 | 34.6 |  |  |  |  | 0.0 | 65.7 | 48.0 | 100.3 | 0.0 | 0.0 |
| 110.50 |  | 48.0 | 25.9 |  |  |  |  | 0.0 | 58.0 | 48.0 | 83.9 | 0.0 | 0.0 |
| 111.00 |  | 48.0 | 25.8 |  |  |  |  | 0.0 | 58.0 | 48.0 | 83.8 | 0.0 | 0.0 |
| 111.50 |  | 47.9 | 25.7 |  |  |  |  | 0.0 | 58.0 | 47.9 | 83.7 | 0.0 | 0.0 |
| 112.00 |  | 47.9 | 25.6 |  |  |  |  | 0.0 | 58.0 | 47.9 | 83.6 | 0.0 | 0.0 |
| 112.50 |  | 47.8 | 25.6 |  |  |  |  | 0.0 | 58.0 | 47.8 | 83.5 | 0.0 | 0.0 |
| 113.00 |  | 47.8 | 25.5 |  |  |  |  | 0.0 | 58.0 | 47.8 | 83.4 | 0.0 | 0.0 |
| 113.50 |  | 47.7 | 25.4 |  |  |  |  | 0.0 | 58.0 | 47.7 | 83.3 | 0.0 | 0.0 |
| 114.00 |  | 47.7 | 25.3 |  |  |  |  | 0.0 | 58.0 | 47.7 | 83.2 | 0.0 | 0.0 |
| 114.50 |  | 47.6 | 25.2 |  |  |  |  | 0.0 | 58.0 | 47.6 | 83.1 | 0.0 | 0.0 |
| 115.00 |  | 47.6 | 25.1 |  |  |  |  | 0.0 | 58.0 | 47.6 | 83.0 | 0.0 | 0.0 |
| 115.50 |  | 47.5 | 25.0 |  |  |  |  | 0.0 | 58.0 | 47.5 | 82.9 | 0.0 | 0.0 |
| 116.00 |  | 47.5 | 24.9 |  |  |  |  | 0.0 | 58.0 | 47.5 | 82.9 | 0.0 | 0.0 |
| 116.50 | Reinf. Top | 47.4 | 24.8 |  |  |  |  | 0.0 | 58.0 | 47.4 | 82.8 | 0.0 | 0.0 |
| 117.00 |  | 47.4 | 24.7 |  |  |  |  | 0.0 | 27.4 | 47.4 | 52.0 | 0.0 | 0.0 |
| 117.50 |  | 47.4 | 24.6 |  |  |  |  | 0.0 | 27.4 | 47.4 | 51.9 | 0.0 | 0.0 |
| 118.00 |  | 47.3 | 24.5 |  |  |  |  | 0.0 | 27.4 | 47.3 | 51.8 | 0.0 | 0.0 |
| 118.50 |  | 47.3 | 24.4 |  |  |  |  | 0.0 | 27.4 | 47.3 | 51.8 | 0.0 | 0.0 |
| 119.00 |  | 47.2 | 24.3 |  |  |  |  | 0.0 | 27.4 | 47.2 | 51.7 | 0.0 | 0.0 |
| 119.50 |  | 47.2 | 24.2 |  |  |  |  | 0.0 | 27.4 | 47.2 | 51.6 | 0.0 | 0.0 |
| 120.00 |  | 47.1 | 24.1 |  |  |  |  | 0.0 | 27.4 | 47.1 | 51.5 | 0.0 | 0.0 |
| 120.50 |  | 47.0 | 24.0 |  |  |  |  | 0.0 | 27.4 | 47.0 | 51.4 | 0.0 | 0.0 |
| 121.00 |  | 47.0 | 23.9 |  |  |  |  | 0.0 | 27.4 | 47.0 | 51.3 | 0.0 | 0.0 |
| 121.50 |  | 46.9 | 23.8 |  |  |  |  | 0.0 | 27.4 | 46.9 | 51.2 | 0.0 | 0.0 |
| 122.00 |  | 46.9 | 23.7 |  |  |  |  | 0.0 | 27.4 | 46.9 | 51.1 | 0.0 | 0.0 |
| 122.50 |  | 46.8 | 23.6 |  |  |  |  | 0.0 | 27.4 | 46.8 | 51.0 | 0.0 | 0.0 |
| 123.00 |  | 46.8 | 23.5 |  |  |  |  | 0.0 | 27.4 | 46.8 | 50.9 | 0.0 | 0.0 |
| 123.50 |  | 46.7 | 23.4 |  |  |  |  | 0.0 | 27.4 | 46.7 | 50.8 | 0.0 | 0.0 |
| 124.00 |  | 46.7 | 23.3 |  |  |  |  | 0.0 | 27.4 | 46.7 | 50.7 | 0.0 | 0.0 |
| 124.50 |  | 46.6 | 23.2 |  |  |  |  | 0.0 | 27.4 | 46.6 | 50.6 | 0.0 | 0.0 |
| 125.00 |  | 46.6 | 23.1 |  |  |  |  | 0.0 | 27.4 | 46.6 | 50.5 | 0.0 | 0.0 |
| 125.50 |  | 46.5 | 23.0 |  |  |  |  | 0.0 | 27.4 | 46.5 | 50.4 | 0.0 | 0.0 |
| 126.00 |  | 46.5 | 22.9 |  |  |  |  | 0.0 | 27.4 | 46.5 | 50.3 | 0.0 | 0.0 |
| 126.50 12700 |  | 46.4 | 22.8 |  |  |  |  | 0.0 | 27.4 | 46.4 | 50.2 | 0.0 | 0.0 |
| 127.00 127 |  | 46.3 | 22.7 |  |  |  |  | 0.0 | 27.4 | 46.3 | 50.1 | 0.0 | 0.0 |
| 127.50 |  | 46.3 | 22.7 |  |  |  |  | 0.0 | 27.4 | 46.3 | 50.0 | 0.0 | 0.0 |
| 128.00 |  | 46.2 | 22.6 |  |  |  |  | 0.0 | 27.4 | 46.2 | 49.9 | 0.0 | 0.0 |
| 128.50 |  | 46.2 | 22.5 |  |  |  |  | 0.0 | 27.4 | 46.2 | 49.8 | 0.0 | 0.0 |
| $\begin{aligned} & 129.00 \\ & 129.50 \end{aligned}$ |  | 46.1 | 22.4 |  |  |  |  | 0.0 | 27.4 | 46.1 | 49.7 | 0.0 | 0.0 |
| 129.50 130.00 |  | 46.0 | 22.3 |  |  |  |  | 0.0 | 27.4 | 46.0 | 49.6 | 0.0 | 0.0 |
| 130.00 130.50 |  | 46.0 | 22.2 |  |  |  |  | 0.0 | 27.4 | 46.0 | 49.5 | 0.0 | 0.0 |
| 130.50 |  | 45.9 | 22.1 |  |  |  |  | 0.0 | 27.4 | 45.9 | 49.4 | 0.0 | 0.0 |
| 131.00 | Appurtenance(s) | 41.4 | 22.0 | 3,718.4 | 0.0 | 0.0 | 3,830.6 | 0.0 | 27.4 | $3,759.7$ | $3,880.0$ | 0.0 | 0.0 |
| 131.50 |  | 36.8 | 21.9 |  |  |  |  | 0.0 | 20.4 | $36.8$ | $42.3$ | 0.0 | 0.0 |
| 132.00 13250 |  | 36.7 36.6 | 21.8 |  |  |  |  | 0.0 | 20.4 | 36.7 | 42.2 | 0.0 | 0.0 |
| 132.50 |  | 36.6 | 21.7 |  |  |  |  | 0.0 | 20.4 | 36.6 | 42.1 | 0.0 | 0.0 |
| 133.00 |  | 36.6 | 21.6 |  |  |  |  | 0.0 | 20.4 | 36.6 | 42.0 | 0.0 | 0.0 |
| 133.50 134.00 |  | 36.5 | 21.5 |  |  |  |  | 0.0 | 20.4 | 36.5 | 41.9 | 0.0 | 0.0 |
| 134.00 134.50 |  | 36.4 36.3 | 21.4 |  |  |  |  | 0.0 | 20.4 | 36.4 | 41.8 | 0.0 | 0.0 |
| 134.50 135.00 |  | 36.3 | 21.3 |  |  |  |  | 0.0 | 20.4 | 36.3 | 41.7 | 0.0 | 0.0 |
| 135.00 |  | 36.3 | 21.2 |  |  |  |  | 0.0 | 20.4 | 36.3 | 41.6 | 0.0 | 0.0 |
| 135.50 |  | 36.2 | 21.1 |  |  |  |  | 0.0 | 20.4 | 36.2 | 41.5 | 0.0 | 0.0 |
| 136.00 |  | 36.1 | 21.0 |  |  |  |  | 0.0 | 20.4 | 36.1 | 41.4 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | ©2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm-Haddam, CT | Engineering Number: |  |

Customer: SPRINT NEXTEL


Page: 14

| Load Case: $1.2 \mathrm{D}+1.6 \mathrm{~W}$ | 101 mph with No Ice | 41 Iterations |
| :--- | :---: | :---: |
| Gust Response Factor : 1.10 |  | Wind Importance Factor : 1.00 |
| Dead Load Factor: 1.20 |  |  |
| Wind Load Factor : 1.60 |  |  |

Calculated Forces

| Seg Elev (ft) | $\begin{gathered} \text { Pu } \\ \text { FY (-) } \\ \text { (kips) } \\ \hline \end{gathered}$ | $\begin{aligned} & \text { Vu } \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ | Tu <br> MY (ft-kips) | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MZ} \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant <br> Moment <br> (ft-kips) | phi <br> Pn <br> (kips) phi <br> Vn <br> (kips $)$ | phi phi <br> Tn Mn <br> (ft-kips) (ft-kips) | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -42.08 | -22.07 | 0.00 | -2,345.13 | 0.00 | 2,345.13 | 3,157.17 1,578.58 | 4,812.28 2,376.61 | 0.00 | 0.00 | 0.612 |
| 0.50 | -41.93 | -22.04 | 0.00 | -2,334.09 | 0.00 | 2,334.09 | 3,152.93 1,576.47 | 4,795.55 2,368.34 | 0.00 | -0.03 | 0.611 |
| 1.00 | -41.77 | -22.01 | 0.00 | -2,323.07 | 0.00 | 2,323.07 | 3,148.69 1,574.34 | 4,778.83 2,360.09 | 0.01 | -0.05 | 0.610 |
| 1.50 | -41.62 | -21.98 | 0.00 | -2,312.07 | 0.00 | 2,312.07 | 3,144.43 1,572.22 | 4,762.13 2,351.84 | 0.01 | -0.08 | 0.609 |
| 2.00 | -41.46 | -21.95 | 0.00 | -2,301.08 | 0.00 | 2,301.08 | 3,140.17 1,570.08 | 4,745.43 2,343.59 | 0.02 | -0.10 | 0.607 |
| 2.50 | -41.31 | -21.92 | 0.00 | -2,290.11 | 0.00 | 2,290.11 | 3,135.89 1,567.94 | 4,728.75 2,335.35 | 0.04 | -0.13 | 0.606 |
| 3.00 | -41.16 | -21.89 | 0.00 | -2,279.15 | 0.00 | 2,279.15 | 3,131.60 1,565.80 | 4,712.08 2,327.12 | 0.05 | -0.16 | 0.605 |
| 3.50 | -41.00 | -21.86 | 0.00 | -2,268.21 | 0.00 | 2,268.21 | 3,127.31 1,563.65 | 4,695.42 2,318.89 | 0.07 | -0.18 | 0.603 |
| 4.00 | -40.85 | -21.83 | 0.00 | -2,257.28 | 0.00 | 2,257.28 | 3,123.00 1,561.50 | 4,678.77 2,310.67 | 0.09 | -0.21 | 0.602 |
| 4.50 | -40.70 | -21.80 | 0.00 | -2,246.37 | 0.00 | 2,246.37 | 3,118.68 1,559.34 | 4,662.14 2,302.45 | 0.11 | -0.24 | 0.600 |
| 5.00 | -40.55 | -21.77 | 0.00 | -2,235.47 | 0.00 | 2,235.47 | 3,114.35 1,557.18 | 4,645.51 2,294.24 | 0.14 | -0.26 | 0.599 |
| 5.50 | -40.39 | -21.73 | 0.00 | -2,224.59 | 0.00 | 2,224.59 | 3,110.02 1,555.01 | 4,628.91 2,286.04 | 0.17 | -0.29 | 0.598 |
| 6.00 | -40.24 | -21.70 | 0.00 | -2,213.72 | 0.00 | 2,213.72 | 3,105.67 1,552.83 | 4,612.31 2,277.85 | 0.20 | -0.31 | 0.596 |
| 6.50 | -40.09 | -21.67 | 0.00 | -2,202.87 | 0.00 | 2,202.87 | 3,101.31 1,550.65 | 4,595.73 2,269.66 | 0.23 | -0.34 | 0.595 |
| 7.00 | -39.94 | -21.64 | 0.00 | -2,192.03 | 0.00 | 2,192.03 | 3,096.94 1,548.47 | 4,579.16 2,261.47 | 0.27 | -0.37 | 0.594 |
| 7.50 | -39.78 | -21.61 | 0.00 | -2,181.21 | 0.00 | 2,181.21 | 3,092.56 1,546.28 | 4,562.60 2,253.30 | 0.31 | -0.39 | 0.592 |
| 8.00 | -39.63 | -21.58 | 0.00 | -2,170.41 | 0.00 | 2,170.41 | 3,088.17 1,544.08 | 4,546.06 2,245.13 | 0.35 | -0.42 | 0.591 |
| 8.50 | -39.46 | -21.55 | 0.00 | -2,159.61 | 0.00 | 2,159.61 | 3,083.77 1,541.88 | 4,529.53 2,236.96 | 0.40 | -0.45 | 0.590 |
| 9.00 | -39.28 | -21.52 | 0.00 | -2,148.84 | 0.00 | 2,148.84 | 3,079.36 1,539.68 | 4,513.01 2,228.81 | 0.45 | -0.47 | 0.588 |
| 50 | -39.10 | -21.49 | 0.00 | -2,138.08 | 0.00 | 2,138.08 | 3,074.94 1,537.47 | 4,496.51 2,220.66 | 0.50 | -0.50 | 0.587 |
| 10.00 | -38.92 -38.74 | -21.46 -21.43 | 0.00 | -2,127.33 | 0.00 | 2,127.33 | 3,070.50 1,535.25 | 4,480.02 2,212.51 | 0.55 | -0.52 | 0.585 |
| 11.00 | -38.74 | -21.43 -21.40 | 0.00 0.00 | -2,116.60 | 0.00 | 2,116.60 | 3,066.06 1,533.03 | 4,463.54 2,204.38 | 0.61 | -0.55 | 0.584 |
| 11.50 | -38.39 | -21.40 | 0.00 | $-2,105.89$ $-2,095.19$ | 0.00 | $2,105.89$ $2,095.19$ | $3,061.61$ <br> $3,057.15$ <br> $1,530.80$ | 4,447.08 2,196.25 | 3 | -0.58 | 0.583 |
| 12.00 | -38.21 | -21.34 | 0.00 | -2,084.50 | 0.00 | 2,084.50 | 3,052.67 1,526.34 | 4,414.20 2,180.01 | 0.80 | -0.63 | 0.580 |
| 12.50 | -38.04 | -21.31 | 0.00 | -2,073.84 | 0.00 | 2,073.84 | 3,048.19 1,524.09 | 4,397.78 2,171.90 | 0.86 | -0.66 | 0.578 |
| 13.00 | -37.86 | -21.27 | 0.00 | -2,063.18 | 0.00 | 2,063.18 | 3,043.69 1,521.85 | 4,381.37 2,163.80 | 0.93 | -0.68 | 0.577 |
| 13.50 | -37.68 | -21.24 | 0.00 | -2,052.55 | 0.00 | 2,052.55 | 3,039.19 1,519.59 | 4,364.98 2,155.70 | 1.01 | -0.71 | 0.576 |
| 14.00 | -37.51 | -21.21 | 0.00 | -2,041.93 | 0.00 | 2,041.93 | 3,034.67 1,517.34 | 4,348.61 2,147.61 | 1.08 | -0.74 | 0.574 |
| 14.50 15.00 | -37.33 -37.15 | -21.18 | 0.00 | -2,031.32 | 0.00 | 2,031.32 | 3,030.15 1,515.07 | 4,332.24 2,139.53 | 1.16 | -0.76 | 0.573 |
| 15.00 | -37.15 | -21.15 | 0.00 | -2,020.73 | 0.00 | 2,020.73 | 3,025.61 1,512.81 | 4,315.90 2,131.46 | 1.24 | -0.79 | 0.571 |
| 15.50 | -36.98 | -21.12 | 0.00 | -2,010.15 | 0.00 | 2,010.15 | 3,021.07 1,510.53 | 4,299.57 2,123.39 | 1.33 | -0.82 | 0.570 |
| 16.00 | -36.80 | -21.09 | 0.00 | -1,999.60 | 0.00 | 1,999.60 | 3,016.51 1,508.25 | 4,283.25 2,115.33 | 1.41 | -0.84 | 0.569 |
| 16.50 | -36.63 | -21.06 | 0.00 | -1,989.05 | 0.00 | 1,989.05 | 3,011.94 1,505.97 | 4,266.95 2,107.28 | 1.50 | -0.87 | 0.567 |
| 17.00 | -36.45 | -21.02 | 0.00 | -1,978.52 | 0.00 | 1,978.52 | 3,007.37 1,503.68 | 4,250.66 2,099.24 | 1.60 | -0.90 | 0.566 |
| 17.50 | -36.28 | -20.99 | 0.00 | -1,968.01 | 0.00 | 1,968.01 | 3,002.78 1,501.39 | 4,234.39 2,091.20 | 1.69 | -0.92 | 0.564 |
| 18.00 | -36.11 | -20.96 | 0.00 | -1,957.52 | 0.00 | 1,957.52 | 2,998.18 1,499.09 | 4,218.13 2,083.18 | 1.79 | -0.95 | 0.563 |
| 18.50 | -35.93 | -20.93 | 0.00 | -1,947.03 | 0.00 | 1,947.03 | 2,993.57 1,496.79 | 4,201.89 2,075.15 | 1.89 | -0.98 | 0.561 |
| 19.00 | -35.76 | -20.90 | 0.00 | -1,936.57 | 0.00 | 1,936.57 | 2,988.95 1,494.48 | 4,185.66 2,067.14 | 2.00 | -1.00 | 0.560 |
| 19.50 | -35.58 | -20.87 | 0.00 | -1,926.12 | 0.00 | 1,926.12 | 2,984.32 1,492.16 | 4,169.45 2,059.13 | 2.10 | -1.03 | 0.558 |
| 20.00 | -35.41 | -20.84 | 0.00 | -1,915.69 | 0.00 | 1,915.69 | 2,979.68 1,489.84 | 4,153.25 2,051.14 | 2.21 | -1.06 | 0.557 |
| 20.50 | -35.24 | -20.80 | 0.00 | -1,905.27 | 0.00 | 1,905.27 | 2,975.03 1,487.52 | 4,137.08 2,043.15 | 2.32 | -1.08 | 0.556 |
| 21.00 | -35.07 -34.89 | -20.77 | 0.00 | -1,894.87 | 0.00 | 1,894.87 | 2,970.37 1,485.19 | 4,120.91 2,035.16 | 2.44 | -1.11 | 0.554 |
| 21.50 22.00 | -34.89 | -20.74 -20.71 | 0.00 | -1,884.48 | 0.00 | 1,884.48 | 2,965.70 1,482.85 | 4,104.77 2,027.19 | 2.56 | -1.14 | 0.553 |
| 22.50 | -34.72 | -20.71 -20.68 | 0.00 | -1,874.11 | 0.00 | 1,874.11 | 2,961.02 1,480.51 | 4,088.63 2,019.22 | 2.68 | -1.16 | 0.551 |
| 23.00 | -34.55 | -20.68 | 0.00 | -1,863.76 | 0.00 | 1,863.76 | 2,956.33 1,478.16 | 4,072.52 2,011.26 | 2.80 | -1.19 | 0.550 |
| 23.50 | -34.38 | -20.64 | 0.00 | -1,853.42 | 0.00 | 1,853.42 | 2,951.62 1,475.81 | 4,056.42 2,003.31 | 2.93 | -1.22 | 0.548 |
| 23.50 | -34.20 | -20.61 | 0.00 | -1,843.10 | 0.00 | 1,843.10 | 2,946.91 1,473.46 | 4,040.34 1,995.37 | 3.06 | -1.24 | 0.547 |
| 24.00 | -34.03 | -20.58 | 0.00 | -1,832.79 | 0.00 | 1,832.79 | 2,942.19 1,471.09 | 4,024.27 1,987.44 | 3.19 | -1.27 | 0.545 |
| 24.50 | -33.86 | -20.55 | 0.00 | -1,822.50 | 0.00 | 1,822.50 | 2,937.46 1,468.73 | 4,008.22 1,979.51 | 3.32 | -1.30 | 0.544 |
| 25.00 | -33.69 | -20.52 | 0.00 | -1,812.23 | 0.00 | 1,812.23 | 2,932.71 1,466.36 | 3,992.19 1,971.59 | 3.46 | -1.32 | 0.542 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

| Load Case: $1.2 \mathrm{D}+1.6 \mathrm{~W}$ |  |  |  | 101 mph with No lce |  |  |  | 41 Iterations |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 Wind Importance Factor : <br> Dead Load Factor: 1.20  <br> Wind Load Factor: 1.60  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| $\begin{aligned} & 25.50 \\ & 26.00 \\ & 26.50 \end{aligned}$ | $-33.52$ | -20.48 | 0.00 | -1,801.97 | 0.00 | $1,801.97$ | 2,927.96 1,463 | 3,9 | 1,963.68 | 3.60 | -1.35 | 0.541 |
|  | -33.35 | -20.45 | 0.00 | -1,791.73 | 0.00 | 1,791.73 | 2,923.19 1,461.60 | 3,960.18 | 1,955.78 | 3.74 | -1.38 | 0.539 |
|  | -33.18 | -20.42 | 0.00 | -1,781.50 | 0.00 | 1,781.50 | 2,918.42 1,459.21 | 3,944.20 | 1,947.89 | 3.89 | -1.40 | 0.538 |
| $\begin{aligned} & 26.50 \\ & 27.00 \end{aligned}$ | -33.01 | -20.39 | 0.00 | -1,771.29 | 0.00 | 1,771.29 | 2,913.63 1,456.82 | 3,928.23 | 1,940.01 | 4.04 | -1.43 | 0.536 |
|  | -32.84 | -20.35 | 0.00 | -1,761.10 | 0.00 | 1,761.10 | 2,910.08 1,455.04 | 3,913.96 | 1,932.96 | 4.19 | -1.46 | 0.534 |
| $\begin{aligned} & 27.50 \\ & 28.00 \end{aligned}$ | -32.67 | -20.32 | 0.00 | -1,750.93 | 0.00 | 1,750.93 | 2,903.11 1,451.55 | 3,895.11 | 1,923.65 | 4.34 | -1.48 | 0.533 |
|  | -32.50 | -20.29 | 0.00 | -1,740.77 | 0.00 | 1,740.77 | 2,896.13 1,448.07 | 3,876.32 | 1,914.37 | 4.50 | -1.51 | 0.532 |
| $\begin{aligned} & 28.50 \\ & 29.00 \end{aligned}$ | -32.33 | -20.25 | 0.00 | -1,730.62 | 0.00 | 1,730.62 | 2,889.16 1,444.58 | 3,857.57 | 1,905.11 | 4.66 | -1.54 | 0.531 |
| 29.50 | -32.16 | -20.22 | 0.00 | -1,720.49 | 0.00 | 1,720.49 | 2,882.19 1,441.09 | 3,838.86 | 1,895.87 | 4.82 | -1.57 | 0.530 |
| $\begin{aligned} & 29.50 \\ & 30.00 \end{aligned}$ | -31.99 | -20.19 | 0.00 | -1,710.38 | 0.00 | 1,710.38 | 2,875.21 1,437.61 | 3,820.20 | 1,886.65 | 4.99 | -1.59 | 0.529 |
|  | -31.82 | -20.15 | 0.00 | -1,700.29 | 0.00 | 1,700.29 | 2,868.24 1,434.12 | 3,801.59 | 1,877.46 | 5.16 | -1.62 | 0.527 |
| $\begin{aligned} & 31.00 \\ & 31.50 \end{aligned}$ | -31.65 | -20.12 | 0.00 | -1,690.21 | 0.00 | 1,690.21 | 2,861.26 1,430.63 | 3,783.02 | 1,868.29 | 5.33 | -1.65 | 0.526 |
|  | -31.49 | -20.09 | 0.00 | -1,680.15 | 0.00 | 1,680.15 | 2,854.29 1,427.15 | 3,764.50 | 1,859.14 | 5.50 | -1.67 | 0.525 |
| $\begin{aligned} & 31.50 \\ & 32.00 \end{aligned}$ | -31.25 | -20.05 | 0.00 | -1,670.11 | 0.00 | 1,670.11 | 2,847.32 1,423.66 | 3,746.02 | 1,850.02 | 5.68 | -1.70 | 0.516 |
|  | -31.02 | -20.01 | 0.00 | -1,660.08 | 0.00 | 1,660.08 | 2,840.34 1,420.17 | 3,727.58 | 1,840.91 | 5.86 | -1.73 | 0.515 |
| $\begin{aligned} & 32.50 \\ & 33.00 \end{aligned}$ | -30.78 | -19.97 | 0.00 | -1,650.08 | 0.00 | 1,650.08 | 2,833.37 1,416.69 | 3,709.20 | 1,831.83 | 6.04 | -1.75 | 0.513 |
|  | -30.55 | -19.94 | 0.00 | -1,640.09 | 0.00 | 1,640.09 | 2,826.40 1,413.20 | 3,690.85 | 1,822.77 | 6.23 | -1.78 | 0.512 |
| $\begin{aligned} & 33.50 \\ & 34.00 \end{aligned}$ | -30.32 | -19.90 | 0.00 | -1,630.12 | 0.00 | 1,630.12 | 2,819.42 1,409.71 | 3,672.56 | 1,813.74 | 6.41 | -1.81 | 0.511 |
| 34.50 | -30.08 | -19.86 | 0.00 | -1,620.18 | 0.00 | 1,620.18 | 2,812.45 1,406.22 | 3,654.31 | 1,804.72 | 6.60 | -1.83 | 0.510 |
| 35.0035.50 | -29.85 | -19.82 | 0.00 | -1,610.25 | 0.00 | 1,610.25 | 2,805.48 1,402.74 | 3,636.10 | 1,795.73 | 6.80 | -1.86 | 0.508 |
|  | -29.62 | -19.79 | 0.00 | -1,600.34 | 0.00 | 1,600.34 | 2,798.50 1,399.25 | 3,617.94 | 1,786.76 | 6.99 | -1.88 | 0.507 |
| $35.67$ | -29.54 | -19.77 | 0.00 | -1,597.04 | 0.00 | 1,597.04 | 2,248.07 1,124.03 | 2,973.91 | 1,468.70 | 7.06 | -1.89 | 0.583 |
|  | -29.44 | -19.74 | 0.00 | -1,590.45 | 0.00 | 1,590.45 | 2,245.83 1,122.91 | 2,966.06 | 1,464.83 | 7.19 | -1.91 | 0.582 |
| $\begin{aligned} & 30.01 \\ & 36.00 \\ & 36.50 \end{aligned}$ | -29.29 | -19.72 | 0.00 | -1,580.58 | 0.00 | 1,580.58 | 2,242.46 1,121.23 | 2,954.30 | 1,459.02 | 7.39 | -1.94 | 0.580 |
| 36.67 | -29.23 | -19.70 | 0.00 | -1,577.22 | 0.00 | 1,577.22 | 2,241.31 1,120.65 | 2,950.31 | 1,457.05 | 7.46 | -1.95 | 0.579 |
| 336.67 | -29.23 | -19.70 | 0.00 | -1,577.22 | 0.00 | 1,577.22 | 2,241.31 1,120.65 | 2,950.31 | 1,457.05 | 7.46 | -1.95 | 0.622 |
| 37.00 | -29.13 | -19.67 | 0.00 | -1,570.72 | 0.00 | 1,570.72 | 2,239.08 1,119.54 | 2,942.55 | 1,453.22 | 7.60 | -1.97 | 0.621 |
| 37.50 | -28.99 | -19.64 | 0.00 | -1,560.89 | 0.00 | 1,560.89 | 2,235.69 1,117.84 | 2,930.81 | 1,447.42 | 7.81 | $-2.00$ | 0.619 |
| $\begin{aligned} & 38.00 \\ & 38.50 \end{aligned}$ | -28.84 | -19.60 | 0.00 | -1,551.07 | 0.00 | 1,551.07 | 2,232.29 1,116.14 | 2,919.08 | 1,441.62 | 8.02 | $-2.03$ | 0.616 |
|  | -28.69 | -19.56 | 0.00 | -1,541.27 | 0.00 | 1,541.27 | 2,228.88 1,114.44 | 2,907.36 | 1,435.83 | 8.23 | -2.06 | 0.614 |
| 39.00 | -28.54 | -19.53 | 0.00 | -1,531.49 | 0.00 | 1,531.49 | 2,225.46 1,112.73 | 2,895.64 | 1,430.05 | 8.45 | -2.09 | 0.612 |
| 39.50 | -28.40 | -19.49 | 0.00 | -1,521.73 | 0.00 | 1,521.73 | 2,222.03 1,111.01 | 2,883.93 | 1,424.27 | 8.67 | -2.12 | 0.610 |
| 40.00 | -28.25 | -19.45 | 0.00 | -1,511.98 | 0.00 | 1,511.98 | 2,218.59 1,109.29 | 2,872.23 | 1,418.49 | 8.89 | -2.15 | 0.608 |
| $\begin{aligned} & 40.50 \\ & 41.00 \end{aligned}$ |  | -19.42 | 0.00 | -1,502.25 | 0.00 | 1,502.25 | 2,215.14 1,107.57 | 2,860.55 | 1,412.72 | 9.12 | -2.18 | 0.605 |
|  | -27.96 | -19.38 | 0.00 | -1,492.55 | 0.00 | 1,492.55 | 2,211.67 1,105.84 | $2,848.87$ | 1,406.95 | 9.35 | -2.21 | 0.603 |
| 41.50 | -27.81 | -19.34 | 0.00 | -1,482.86 |  | 1,482.86 | 2,208.20 1,104.10 | 2,837.20 | 1,401.18 | 9.58 | -2.24 | 0.601 |
| 42.00 | -27.67 | -19.31 | 0.00 | -1,473.19 | 0.00 | 1,473.19 | 2,204.72 1,102.36 | $2,825.53$ | 1,395.43 | 9.82 | -2.27 | 0.599 |
| $\begin{aligned} & 42.50 \\ & 43.00 \end{aligned}$ | -27.52 | -19.27 | 0.00 | -1,463.53 | 0.00 | 1,463.53 | 2,201.23 1,100.61 | 2,813.88 | 1,389.67 | 10.06 | -2.30 |  |
|  | -27.38 | -19.23 | 0.00 | -1,453.90 | 0.00 | 1,453.90 | 2,197.72 1,098.86 | 2,802.24 | 1,383.92 | 10.30 | -2.33 | 0.594 |
| 43.50 | -27.23 | -19.19 | 0.00 | -1,444.28 | 0.00 | 1,444.28 | 2,194.21 1,097.10 | 2,790.61 | 1,378.18 | 10.55 | -2.36 | 0.592 |
| 44.00 | -27.09 | -19.15 | 0.00 | -1,434.69 | 0.00 | 1,434.69 | 2,190.68 1,095.34 | 2,778.98 | 1,372.44 | 10.80 | -2.39 | 0.590 |
| $\begin{aligned} & 44.50 \\ & 45.00 \end{aligned}$ | -26.94 | -19.11 | 0.00 | -1,425.11 |  | 1,425.11 | 2,187.15 1,093.57 | 2,767.37 | 1,366.70 | 11.05 | -2.42 | 0.588 |
|  | -26.80 | -19.08 | 0.00 | $-1,415.56$ | 0.00 | 1,415.56 | 2,183.60 1,091.80 | 2,755.77 | 1,360.97 | 11.31 | -2.45 | 0.586 |
| 45.50 | -26.66 | -19.04 | 0.00 | -1,406.02 | 0.00 | 1,406.02 | 2,180.05 1,090.02 | 2,744.17 | 1,355.24 | 11.56 | -2.48 | 0.583 |
| 46.00 | -26.51 | -19.00 | 0.00 | -1,396.50 | 0.00 | 1,396.50 | 2,176.48 $1,088.24$ | 2,732.59 | 1,349.52 | 11.83 | -2.51 | 0.581 |
| $\begin{aligned} & 46.50 \\ & 47.00 \end{aligned}$ | -26.37 | -18.96 | 0.00 | -1,387.00 | 0.00 | 1,387.00 | 2,172.91 1,086.45 | 2,721.02 | 1,343.81 | 12.09 | -2.54 | 0.579 |
|  | -26.23 | -18.92 | 0.00 | $-1,377.52$ | 0.00 | 1,377.52 | 2,169.32 1,084.66 | 2,709.45 | 1,338.10 | 12.36 | -2.57 | 0.577 |
| 47.50 | -26.08 | -18.88 | 0.00 | -1,368.07 | 0.00 | 1,368.07 | 2,165.72 1,082.86 | 2,697.90 | 1,332.39 | 12.63 | -2.60 | 0.574 |
| 48.0048.50 | -25.94 | -18.84 | 0.00 | -1,358.63 | 0.00 | 1,358.63 | 2,162.11 1,081.06 | 2,686.36 | 1,326.69 | 12.90 | -2.63 | 0.572 |
|  | -25.80 | -18.80 | 0.00 | -1,349.21 | 0.00 | 1,349.21 | 2,158.50 1,079.25 | 2,674.83 | 1,321.00 | 13.18 | -2.66 | 0.570 |
| 49.00 | -25.65 | -18.76 | 0.00 | -1,339.81 | 0.00 | 1,339.81 | 2,154.87 1,077.43 | 2,663.31 | 1,315.31 | 13.46 | -2.69 | 0.568 |
| $\begin{aligned} & 49.50 \\ & 50.00 \end{aligned}$ | -25.51 | -18.72 | 0.00 | -1,330.43 | 0.00 | 1,330.43 | 2,151.23 1,075.61 | 2,651.80 | 1,309.62 | 13.75 | -2.72 | 0.565 |
|  | -25.37 | -18.68 | 0.00 | -1,321.07 | 0.00 | 1,321.07 | 2,147.58 1,073.79 | 2,640.30 | 1,303.95 | 14.03 | -2.75 | 0.563 |
| 50.50 | -25.23 | -18.63 | 0.00 | -1,311.74 | 0.00 | 1,311.74 | 2,143.92 1,071.96 | 2,628.81 | 1,298.27 | 14.32 | -2.78 | 0.561 |
| 51.00 | -25.09 | -18.59 | 0.00 | -1,302.42 | 0.00 | 1,302.42 | 2,140.25 1,070.13 | 2,617.34 | 1,292.60 | 14.62 | -2.81 | 0.558 |
| 51.5052.00 | -24.94 | -18.55 | 0.00 | -1,293.12 | 0.00 | 1,293.12 | 2,136.57 1,068.29 |  | 1,286.94 | 14.91 | -2.84 | 0.556 |
|  | $52.00-24.80$ | -18.51 | 0.00 | $-1,283.85$ | 0.00 | 1,283.85 | 2,132.88 1,066.4 | 2,594 | 1,281.2 | 15.21 | -2.87 | 0.554 |

Customer: SPRINT NEXTEL

| Load Case: 1.2D + 1.6W |  |  |  |  | 101 mph with No Ice |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 <br> Dead Load Factor: 1.20 <br> Wind Load Factor: 1.60 |  |  |  |  |  |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
| 52.50 | -24.66 | -18.47 | 0.00 | -1,274.59 | 0.00 | 1,274.59 | 2,129.1 | 1,064.59 | 2,582.98 | 1,275.64 | 15.51 | -2.90 | 0.551 |
| 53.00 | -24.52 | -18.43 | 0.00 | -1,265.36 | 0.00 | 1,265.36 | 2,125.47 | 1,062.73 | 2,571.55 | 1,269.99 | 15.82 | -2.93 | 0.549 |
| 53.50 | -24.38 | -18.38 | 0.00 | -1,256.15 | 0.00 | 1,256.15 | 2,121.75 | 1,060.87 | 2,560.13 | 1,264.35 | 16.13 | -2.96 | 0.547 |
| 54.00 | -24.24 | -18.34 | 0.00 | -1,246.96 | 0.00 | 1,246.96 | 2,118.01 | 1,059.01 | 2,548.72 | 1,258.72 | 16.44 | -2.99 | 0.544 |
| 54.50 | -24.10 | -18.30 | 0.00 | -1,237.79 | 0.00 | 1,237.79 | 2,114.27 | 1,057.14 | 2,537.32 | 1,253.09 | 16.76 | -3.02 | 0.542 |
| 55.00 | -23.96 | -18.26 | 0.00 | -1,228.64 | 0.00 | 1,228.64 | 2,110.52 | 1,055.26 | 2,525.94 | 1,247.47 | 17.07 | -3.05 | 0.540 |
| 55.50 | -23.82 | -18.21 | 0.00 | -1,219.51 | 0.00 | 1,219.51 | 2,106.75 | 1,053.38 | 2,514.57 | 1,241.85 | 17.40 | -3.08 | 0.537 |
| 56.00 | -23.68 | -18.17 | 0.00 | -1,210.40 | 0.00 | 1,210.40 | 2,102.98 | 1,051.49 | 2,503.21 | 1,236.24 | 17.72 | -3.11 | 0.535 |
| 56.50 | -23.54 | -18.13 | 0.00 | -1,201.32 | 0.00 | 1,201.32 | 2,099.20 | 1,049.60 | 2,491.86 | 1,230.64 | 18.05 | -3.14 | 0.533 |
| 57.00 | -23.40 | -18.08 | 0.00 | -1,192.26 | 0.00 | 1,192.26 | 2,095.40 | 1,047.70 | 2,480.53 | 1,225.04 | 18.38 | -3.17 | 0.530 |
| 57.50 | -23.27 | -18.04 | 0.00 | -1,183.22 | 0.00 | 1,183.22 | 2,091.60 | 1,045.80 | 2,469.21 | 1,219.45 | 18.71 | -3.20 | 0.528 |
| 58.00 | -23.13 | -17.99 | 0.00 | -1,174.20 | 0.00 | 1,174.20 | 2,087.78 | 1,043.89 | 2,457.90 | 1,213.86 | 19.05 | -3.23 | 0.526 |
| 58.50 | -22.99 | -17.95 | 0.00 | -1,165.20 | 0.00 | 1,165.20 | 2,083.96 | 1,041.98 | 2,446.60 | 1,208.28 | 19.39 | -3.26 | 0.523 |
| 59.00 | -22.85 | -17.91 | 0.00 | -1,156.22 | 0.00 | 1,156.22 | 2,080.12 | 1,040.06 | 2,435.32 | 1,202.71 | 19.73 | -3.29 | 0.521 |
| 59.50 | -22.71 | -17.86 | 0.00 | -1,147.27 | 0.00 | 1,147.27 | 2,076.27 | 1,038.14 | 2,424.04 | 1,197.14 | 20.08 | -3.32 | 0.519 |
| 60.00 | -22.58 | -17.82 | 0.00 | $-1,138.34$ | 0.00 | 1,138.34 | 2,072.41 | 1,036.21 | 2,412.79 | 1,191.58 | 20.43 | -3.35 | 0.516 |
| 60.50 | -22.44 | -17.77 | 0.00 | -1,129.43 | 0.00 | 1,129.43 | 2,068.55 | 1,034.27 | 2,401.54 | 1,186.03 | 20.78 | -3.38 | 0.514 |
| 61.00 | -22.30 | -17.73 | 0.00 | -1,120.55 | 0.00 | 1,120.55 | 2,064.67 | 1,032.33 | 2,390.31 | 1,180.48 | 21.14 | -3.41 | 0.511 |
| 61.50 | -22.16 | -17.68 | 0.00 | -1,111.68 | 0.00 | 1,111.68 | 2,060.78 | 1,030.39 | 2,379.09 | 1,174.94 | 21.50 | -3.44 | 0.509 |
| 62.00 | -22.03 | -17.64 | 0.00 | -1,102.84 | 0.00 | 1,102.84 | 2,056.88 | 1,028.44 | 2,367.88 | 1,169.41 | 21.86 | -3.47 | 0.507 |
| 62.50 | -21.89 | -17.59 | 0.00 | -1,094.02 | 0.00 | 1,094.02 | 2,052.97 | 1,026.49 | 2,356.69 | 1,163.88 | 22.22 | -3.50 | 0.504 |
| 63.00 | -21.75 | -17.55 | 0.00 | -1,085.23 | 0.00 | 1,085.23 | 2,049.05 | 1,024.53 | 2,345.51 | 1,158.36 | 22.59 | -3.53 | 0.502 |
| 63.50 | -21.62 | -17.50 | 0.00 | -1,076.45 | 0.00 | 1,076.45 | 2,045.12 | 1,022.56 | 2,334.35 | 1,152.85 | 22.96 | -3.56 | 0.499 |
| 64.00 | -21.48 | -17.45 | 0.00 | -1,067.70 | 0.00 | 1,067.70 | 2,041.18 | 1,020.59 | 2,323.20 | 1,147.34 | 23.34 | -3.59 | 0.497 |
| 64.50 | -21.35 | -17.41 | 0.00 | -1,058.98 | 0.00 | 1,058.98 | 2,037.23 | 1,018.62 | 2,312.06 | 1,141.84 | 23.71 | -3.62 | 0.494 |
| 65.00 | -21.21 | -17.36 | 0.00 | -1,050.27 | 0.00 | 1,050.27 | 2,033.27 | 1,016.64 | 2,300.94 | 1,136.35 | 24.09 | -3.65 | 0.492 |
| 65.50 | -21.08 | -17.32 | 0.00 | -1,041.59 | 0.00 | 1,041.59 | 2,029.30 | 1,014.65 | 2,289.83 | 1,130.86 | 24.48 | -3.67 | 0.489 |
| 66.00 | -20.94 | -17.27 | 0.00 | -1,032.93 | 0.00 | 1,032.93 | 2,025.32 | 1,012.66 | 2,278.74 | 1,125.38 | 24.86 | -3.70 | 0.487 |
| 66.50 | -20.81 | -17.22 | 0.00 | -1,024.30 | 0.00 | 1,024.30 | 2,021.33 | 1,010.66 | 2,267.65 | 1,119.91 | 25.25 | -3.73 | 0.485 |
| 67.00 | -20.67 | -17.18 | 0.00 | -1,015.69 | 0.00 | 1,015.69 | 2,016.97 | 1,008.48 | 2,256.19 | 1,114.25 | 25.64 | -3.76 | 0.482 |
| 67.50 | -20.54 | -17.13 | 0.00 | -1,007.10 | 0.00 | 1,007.10 | 2,011.16 | 1,005.58 | 2,243.13 | 1,107.80 | 26.04 | -3.79 | 0.480 |
| 68.00 | -20.40 | -17.08 | 0.00 | -998.53 | 0.00 | 998.53 | 2,005.34 | 1,002.67 | 2,230.12 | 1,101.37 | 26.44 | -3.82 | 0.478 |
| 68.50 | -20.27 | -17.04 | 0.00 | -989.99 | 0.00 | 989.99 | 1,999.53 | 999.77 | 2,217.14 | 1,094.96 | 26.84 | -3.85 | 0.476 |
| 69.00 | -20.14 | -16.99 | 0.00 | -981.47 | 0.00 | 981.47 | 1,993.72 | 996.86 | 2,204.19 | 1,088.57 | 27.24 | -3.88 | 0.474 |
| 69.50 | -20.00 | -16.94 | 0.00 | -972.98 | 0.00 | 972.98 | 1,987.91 | 993.96 | 2,191.29 | 1,082.20 | 27.65 | -3.91 | 0.472 |
| 70.00 | -19.87 | -16.89 | 0.00 | -964.51 | 0.00 | 964.51 | 1,982.10 | 991.05 | 2,178.42 | 1,075.84 | 28.06 | -3.94 | 0.470 |
| 70.50 | -19.69 | -16.84 | 0.00 | -956.06 | 0.00 | 956.06 | 1,976.29 | 988.14 | 2,165.59 | 1,069.51 | 28.48 | -3.96 | 0.460 |
| 71.00 | -19.52 | -16.79 | 0.00 | -947.64 | 0.00 | 947.64 | 1,970.48 | 985.24 | 2,152.80 | 1,063.19 | 28.89 | -3.99 | 0.458 |
| 71.50 | -19.34 | -16.74 | 0.00 | -939.25 | 0.00 | 939.25 | 1,964.67 | 982.33 | 2,140.05 | 1,056.89 | 29.31 | -4.02 | 0.456 |
| 72.00 | -19.16 | -16.68 | 0.00 | -930.88 | 0.00 | 930.88 | 1,958.85 | 979.43 | 2,127.34 | 1,050.61 | 29.73 | -4.05 | 0.453 |
| 72.50 | -18.99 | -16.63 | 0.00 | -922.54 | 0.00 | 922.54 | 1,953.04 | 976.52 | 2,114.66 | 1,044.35 | 30.16 | -4.08 | 0.451 |
| 73.00 | -18.81 | -16.58 | 0.00 | -914.23 | 0.00 | 914.23 | 1,947.23 | 973.62 | 2,102.02 | 1,038.11 | 30.59 | -4.11 | 0.449 |
| 73.33 | -18.70 | -16.56 | 0.00 | -908.75 | 0.00 | 908.75 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 30.87 | -4.12 | 0.448 |
| 73.33 | -18.70 | -16.56 | 0.00 | -908.75 | 0.00 | 908.75 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 30.87 | -4.12 | 0.489 |
| 73.50 | -18.64 | -16.53 | 0.00 | -905.94 | 0.00 | 905.94 | 1,473.96 | 736.98 | 1,624.57 | 802.32 | 31.02 | -4.13 | 0.583 |
| 74.00 | -18.52 | -16.48 | 0.00 | -897.68 | 0.00 | 897.68 | 1,471.41 | 735.71 | 1,616.97 | 798.56 | 31.45 | -4.16 | 0.579 |
| 74.50 | -18.41 | -16.43 | 0.00 | -889.44 | 0.00 | 889.44 | 1,468.85 | 734.43 | 1,609.36 | 794.80 | 31.89 | -4.20 | 0.576 |
| 75.00 | -18.29 | -16.39 | 0.00 | -881.22 | 0.00 | 881.22 | 1,466.28 | 733.14 | 1,601.77 | 791.05 | 32.33 | -4.23 | 0.572 |
| 75.50 | -18.18 | -16.34 | 0.00 | -873.03 | 0.00 | 873.03 | 1,463.70 | 731.85 | 1,594.18 | 787.30 | 32.78 | -4.26 | 0.569 |
| 76.00 | -18.06 | -16.29 | 0.00 | -864.86 | 0.00 | 864.86 | 1,461.11 | 730.55 | 1,586.59 | 783.56 | 33.23 | -4.30 | 0.565 |
| 76.50 | -17.95 | -16.24 | 0.00 | -856.71 | 0.00 | 856.71 | 1,458.51 | 729.25 | 1,579.01 | 779.81 | 33.68 | -4.33 | 0.561 |
| 77.00 | -17.84 | -16.20 | 0.00 | -848.59 | 0.00 | 848.59 | 1,455.89 | 727.95 | 1,571.44 | 776.07 | 34.13 | -4.36 | 0.558 |
| 77.50 | -17.72 | -16.15 | 0.00 | -840.49 | 0.00 | 840.49 | 1,453.27 | 726.64 | 1,563.87 | 772.34 | 34.59 | -4.40 | 0.554 |
| 78.00 | -17.61 | -16.10 | 0.00 | -832.42 | 0.00 | 832.42 | 1,450.64 | 725.32 | 1,556.31 | 768.60 | 35.05 | -4.43 | 0.551 |
| 78.50 | -17.50 | -16.05 | 0.00 | -824.37 | 0.00 | 824.37 | 1,447.99 | 724.00 | 1,548.75 | 764.87 | 35.52 | -4.46 | 0.547 |
| 79.00 | -17.38 | -16.00 | 0.00 | -816.34 | 0.00 | 816.34 | 1,445.34 | 722.67 | 1,541.20 | 761.14 | 35.99 | -4.49 | 0.544 |
| 79.50 | -17.27 | -15.96 | 0.00 | -808.34 | 0.00 | 808.34 | 1,442.68 | 721.34 | 1,533.65 | 757.41 | 36.46 | -4.53 | 0.540 |

Customer: SPRINT NEXTEL


Customer: SPRINT NEXTEL


| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | ---: | ---: | :--- |
| Site Name: | Hddm-Haddam, CT | Engineering Number: | OAA712589 C3 | 05 |

Customer: SPRINT NEXTEL



Applied Segment Forces Summary

|  |  | Shaft Forces |  | Discrete Forces |  |  |  | Linear Forces |  | Sum of Forces |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Seg Elev <br> (ft) | Description | Wind FX <br> (Ib) | Dead Load (lb) | Wind FX <br> (b) | Torsion MY ( $\mathrm{lb}-\mathrm{ft}$ ) | Moment MZ (lb-ft) | Dead Load (b) | Wind FX <br> (b) | Dead Load (lb) | Wind FX <br> (b) | Dead <br> Load <br> (lb) | $\begin{gathered} \text { Torsion } \\ \text { MY } \\ \text { (lb-ft) } \end{gathered}$ | Moment MZ <br> (lb) |
| 0.00 |  | 24.6 | 0.0 |  |  |  |  | 0.0 | 0.0 | 24.6 | 0.0 | 0.0 | 0.0 |
| 0.50 |  | 49.2 | 68.3 |  |  |  |  | 0.0 | 40.2 | 49.2 | 108.5 | 0.0 | 0.0 |
| 1.00 |  | 49.1 | 68.2 |  |  |  |  | 0.0 | 40.2 | 49.1 | 108.4 | 0.0 | 0.0 |
| 1.50 |  | 49.0 | 68.1 |  |  |  |  | 0.0 | 40.2 | 49.0 | 108.2 | 0.0 | 0.0 |
| 2.00 |  | 48.9 | 67.9 |  |  |  |  | 0.0 | 40.2 | 48.9 | 108.1 | 0.0 | 0.0 |
| 2.50 |  | 48.8 | 67.8 |  |  |  |  | 0.0 | 40.2 | 48.8 | 107.9 | 0.0 | 0.0 |
| 3.00 |  | 48.7 | 67.6 |  |  |  |  | 0.0 | 40.2 | 48.7 | 107.8 | 0.0 | 0.0 |
| 3.50 |  | 48.6 | 67.5 |  |  |  |  | 0.0 | 40.2 | 48.6 | 107.6 | 0.0 | 0.0 |
| 4.00 |  | 48.5 | 67.3 |  |  |  |  | 0.0 | 40.2 | 48.5 | 107.5 | 0.0 | 0.0 |
| 4.50 |  | 48.4 | 67.2 |  |  |  |  | 0.0 | 40.2 | 48.4 | 107.4 | 0.0 | 0.0 |
| 5.00 |  | 48.3 | 67.0 |  |  |  |  | 0.0 | 40.2 | 48.3 | 107.2 | 0.0 | 0.0 |
| 5.50 |  | 48.1 | 66.9 |  |  |  |  | 0.0 | 40.2 | 48.1 | 107.1 | 0.0 | 0.0 |
| 6.00 |  | 48.0 | 66.8 |  |  |  |  | 0.0 | 40.2 | 48.0 | 106.9 | 0.0 | 0.0 |
| 6.50 |  | 47.9 | 66.6 |  |  |  |  | 0.0 | 40.2 | 47.9 | 106.8 | 0.0 | 0.0 |
| 7.00 |  | 47.8 | 66.5 |  |  |  |  | 0.0 | 40.2 | 47.8 | 106.6 | 0.0 | 0.0 |
| 7.50 |  | 47.7 | 66.3 |  |  |  |  | 0.0 | 40.2 | 47.7 | 106.5 | 0.0 | 0.0 |
| 8.00 |  | 47.6 | 66.2 |  |  |  |  | 0.0 | 40.2 | 47.6 | 106.3 | 0.0 | 0.0 |
| 8.50 |  | 47.5 | 66.0 |  |  |  |  | 0.0 | 60.7 | 47.5 | 126.7 | 0.0 | 0.0 |
| 9.00 |  | 47.4 | 65.9 |  |  |  |  | 0.0 | 60.7 | 47.4 | 126.6 | 0.0 | 0.0 |
| 9.50 |  | 47.3 | 65.7 |  |  |  |  | 0.0 | 60.7 | 47.3 | 126.4 | 0.0 | 0.0 |
| 10.00 |  | 47.2 | 65.6 |  |  |  |  | 0.0 | 60.7 | 47.2 | 126.3 | 0.0 | 0.0 |
| 10.50 |  | 47.1 | 65.5 |  |  |  |  | 0.0 | 60.7 | 47.1 | 126.1 | 0.0 | 0.0 |
| 11.00 |  | 47.0 | 65.3 |  |  |  |  | 0.0 | 60.7 | 47.0 | 126.0 | 0.0 | 0.0 |
| 11.50 |  | 46.9 | 65.2 |  |  |  |  | 0.0 | 60.7 | 46.9 | 125.8 | 0.0 | 0.0 |
| 12.00 |  | 46.8 | 65.0 |  |  |  |  | 0.0 | 60.7 | 46.8 | 125.7 | 0.0 | 0.0 |
| 12.50 |  | 46.7 | 64.9 |  |  |  |  | 0.0 | 60.7 | 46.7 | 125.6 | 0.0 | 0.0 |
| 13.00 |  | 46.6 | 64.7 |  |  |  |  | 0.0 | 60.7 | 46.6 | 125.4 | 0.0 | 0.0 |
| 13.50 |  | 46.5 | 64.6 |  |  |  |  | 0.0 | 60.7 | 46.5 | 125.3 | 0.0 | 0.0 |
| 14.00 |  | 46.4 | 64.4 |  |  |  |  | 0.0 | 60.7 | 46.4 | 125.1 | 0.0 | 0.0 |
| 14.50 |  | 46.3 | 64.3 |  |  |  |  | 0.0 | 60.7 | 46.3 | 125.0 | 0.0 | 0.0 |
| 15.00 |  | 46.2 | 64.1 |  |  |  |  | 0.0 | 60.7 | 46.2 | 124.8 | 0.0 | 0.0 |
| 15.50 |  | 46.1 | 64.0 |  |  |  |  | 0.0 | 60.7 | 46.1 | 124.7 | 0.0 | 0.0 |
| 16.00 |  | 46.0 | 63.9 |  |  |  |  | 0.0 | 60.7 | 46.0 | 124.5 | 0.0 | 0.0 |
| 16.50 |  | 45.9 | 63.7 |  |  |  |  | 0.0 | 60.7 | 45.9 | 124.4 | 0.0 | 0.0 |
| 17.00 |  | 45.8 | 63.6 |  |  |  |  | 0.0 | 60.7 | 45.8 | 124.3 | 0.0 | 0.0 |
| 17.50 |  | 45.7 | 63.4 |  |  |  |  | 0.0 | 60.7 | 45.7 | 124.1 | 0.0 | 0.0 |
| 18.00 |  | 45.6 | 63.3 |  |  |  |  | 0.0 | 60.7 | 45.6 | 124.0 | 0.0 | 0.0 |
| 18.50 |  | 45.5 | 63.1 |  |  |  |  | 0.0 | 60.7 | 45.5 | 123.8 | 0.0 | 0.0 |
| 19.00 |  | 45.4 | 63.0 |  |  |  |  | 0.0 | 60.7 | 45.4 | 123.7 | 0.0 | 0.0 |
| 19.50 |  | 45.3 | 62.8 |  |  |  |  | 0.0 | 60.7 | 45.3 | 123.5 | 0.0 | 0.0 |
| 20.00 |  | 45.2 | 62.7 |  |  |  |  | 0.0 | 60.7 | 45.2 | 123.4 | 0.0 | 0.0 |
| 20.50 |  | 45.0 | 62.6 |  |  |  |  | 0.0 | 60.7 | 45.0 | 123.2 | 0.0 | 0.0 |
| 21.00 |  | 44.9 | 62.4 |  |  |  |  | 0.0 | 60.7 | 44.9 | 123.1 | 0.0 | 0.0 |
| 21.50 |  | 44.8 | 62.3 |  |  |  |  | 0.0 | 60.7 | 44.8 | 122.9 | 0.0 | 0.0 |
| 22.00 |  | 44.7 | 62.1 |  |  |  |  | 0.0 | 60.7 | 44.7 | 122.8 | 0.0 | 0.0 |
| 22.50 |  | 44.6 | 62.0 |  |  |  |  | 0.0 | 60.7 | 44.6 | 122.7 | 0.0 | 0.0 |
| 23.00 |  | 44.5 | 61.8 |  |  |  |  | 0.0 | 60.7 | 44.5 | 122.5 | 0.0 | 0.0 |
| 23.50 |  | 44.4 | 61.7 |  |  |  |  | 0.0 | 60.7 | 44.4 | 122.4 | 0.0 | 0.0 |

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| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |



| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm-Haddam, CT | Engineering Number: OAA712589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |



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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: $\operatorname{OAA712589\_ C3\_ 05}$ | $4 / 24 / 20185: 53: 55$ PM |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ |  | 101 mph with No Ice (Reduced DL) |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 <br> Dead Load Factor: 0.90 <br> Wind Load Factor : 1.60 |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
| 79.50 | 45.4 | 31.8 | 0.0 | 49.3 | 45.4 | 81.1 | 0.0 | 0.0 |
| 80.00 | 45.4 | 31.8 | 0.0 | 49.3 | 45.4 | 81.0 | 0.0 | 0.0 |
| 80.50 | 45.3 | 31.7 | 0.0 | 49.3 | 45.3 | 80.9 | 0.0 | 0.0 |
| 81.00 | 45.2 | 31.6 | 0.0 | 49.3 | 45.2 | 80.8 | 0.0 | 0.0 |
| 81.50 | 45.2 | 31.5 | 0.0 | 49.3 | 45.2 | 80.7 | 0.0 | 0.0 |
| 82.00 | 45.1 | 31.4 | 0.0 | 49.3 | 45.1 | 80.6 | 0.0 | 0.0 |
| 82.50 | 45.1 | 31.3 | 0.0 | 49.3 | 45.1 | 80.5 | 0.0 | 0.0 |
| 83.00 | 45.0 | 31.2 | 0.0 | 49.3 | 45.0 | 80.4 | 0.0 | 0.0 |
| 83.50 | 44.9 | 31.1 | 0.0 | 49.3 | 44.9 | 80.3 | 0.0 | 0.0 |
| 84.00 | 44.9 | 31.0 | 0.0 | 49.3 | 44.9 | 80.3 | 0.0 | 0.0 |
| 84.50 85.00 | 44.8 | 30.9 | 0.0 | 49.3 | 44.8 | 80.2 | 0.0 | 0.0 |
| 85.00 85.50 | 44.8 | 30.8 30.7 | 0.0 | 49.3 | 44.8 | 80.1 | 0.0 | 0.0 |
| 85.50 | 44.7 | 30.7 | 0.0 | 49.3 | 44.7 | 80.0 | 0.0 | 0.0 |
| 86.00 86.50 | 44.6 | 30.6 | 0.0 | 49.3 | 44.6 | 79.9 | 0.0 | 0.0 |
| 86.50 87.00 | 44.6 | 30.5 30.4 | 0.0 | 49.3 | 44.6 | 79.8 | 0.0 | 0.0 |
| 87.50 | 44.4 | 30.3 | 0.0 0.0 | 49.3 | 44.5 44.4 | 79.7 79.6 | 0.0 0.0 | 0.0 0.0 |
| 88.00 | 44.4 | 30.2 | 0.0 | 49.3 | 44.4 | 79.5 | 0.0 | 0.0 |
| 88.50 | 44.3 | 30.1 | 0.0 | 49.3 | 44.3 | 79.4 | 0.0 | 0.0 |
| 89.00 | 44.2 | 30.0 | 0.0 | 49.3 | 44.2 | 79.3 | 0.0 | 0.0 |
| 89.50 | 44.1 | 29.9 | 0.0 | 49.3 | 44.1 | 79.2 | 0.0 | 0.0 |
| 90.00 | 44.1 | 29.8 | 0.0 | 49.3 | 44.1 | 79.1 | 0.0 | 0.0 |
| 90.50 | 44.0 | 29.7 | 0.0 | 49.3 | 44.0 | 79.0 | 0.0 | 0.0 |
| 91.00 91.50 | 43.9 | 29.6 | 0.0 | 49.3 | 43.9 | 78.9 | 0.0 | 0.0 |
| 91.50 92.00 | 43.9 43.8 | 29.5 29.4 | 0.0 | 49.3 | 43.9 | 78.8 | 0.0 | 0.0 |
| 92.50 | 43.7 | 29.3 | 0. | 3 | 43.8 43.7 | 78.7 78.6 | 0.0 0.0 | 0.0 |
| 93.00 | 43.6 | 29.2 | 0.0 | 49.3 | 43.6 | 78.5 | 0.0 | 0.0 |
| 93.50 | 43.6 | 29.1 | 0.0 | 49.3 | 43.6 | 78.4 | 0.0 | 0.0 |
| 94.00 94.50 | 43.5 43.4 | 29.0 | 0.0 | 49.3 | 43.5 | 78.3 | 0.0 | 0.0 |
| 94.50 95.00 | 43.4 43.3 | 29.0 28.9 | 0.0 | 49.3 | 43.4 | 78.2 | 0.0 | 0.0 |
| 95.00 95.50 | 43.3 | 28.9 28.8 | 0.0 | 49.3 | 43.3 | 78.1 | 0.0 | 0.0 |
| 96.00 | 43.2 | 28.7 | 0. | 49.3 | 43.2 | 78.0 | 0.0 0.0 | 0.0 |
| 96.50 | 43.1 | 28.6 | 0.0 | 49.3 | 43.1 | 77.8 | 0.0 | 0.0 |
| 97.00 | 43.0 | 28.5 | 0.0 | 49.3 | 43.0 | 77.7 | 0.0 | 0.0 |
| 97.50 | 42.9 | 28.4 | 0.0 | 49.3 | 42.9 | 77.6 | 0.0 | 0.0 |
| 98.00 | 42.8 | 28.3 | 0.0 | 49.3 | 42.8 | 77.5 | 0.0 | 0.0 |
| 98.50 | 42.8 | 28.2 | 0.0 | 49.3 | 42.8 | 77.5 | 0.0 | 0.0 |
| 99.00 | 42.7 | 28.1 | 0.0 | 49.3 | 42.7 | 77.4 | 0.0 | 0.0 |
| 99.50 100.00 | 42.6 | 28.0 | 0.0 | 49.3 | 42.6 | 77.3 | 0.0 | 0.0 |
| 100.00 100.50 | 42.5 | 27.9 | 0.0 | 49.3 | 42.5 | 77.2 | 0.0 | 0.0 |
| 101.00 | 42.4 42.3 | 27.8 27.7 | 0.0 | 49.3 | 42.4 | 77.1 | 0.0 | 0.0 |
| 101.50 | 42.2 | 27.6 | 0.0 0.0 | 49.3 49.3 | 42.3 42.2 | 77.0 76.9 | 0.0 0.0 | 0.0 0.0 |
| 102.00 | 42.2 | 27.5 | 0.0 | 49.3 | 42.2 | 76.8 | 0.0 | 0.0 |
| 102.50 | 42.1 | 27.4 | 0.0 | 49.3 | 42.1 | 76.7 | 0.0 | 0.0 |
| 103.00 | 42.0 | 27.3 | 0.0 | 49.3 | 42.0 | 76.6 | 0.0 | 0.0 |
| 103.50 | 41.9 | 27.2 | 0.0 | 49.3 | 41.9 | 76.5 | 0.0 | 0.0 |
| 104.00 | 41.8 | 27.1 | 0.0 | 49.3 | 41.8 | 76.4 | 0.0 | 0.0 |
| 104.50 | 41.7 | 27.0 | 0.0 | 49.3 | 41.7 | 76.3 | 0.0 | 0.0 |
| 105.00 | 41.6 | 26.9 | 0.0 | 49.3 | 41.6 | 76.2 | 0.0 | 0.0 |
| 105.50 | 41.5 | 26.8 | 0.0 | 49.3 | 41.5 | 76.1 | 0.0 | 0.0 |
| 106.00 | 41.4 | 26.7 | 0.0 | 49.3 | 41.4 | 76.0 | 0.0 | 0.0 |
| 106.50 | 41.3 | 26.6 | 0.0 | 49.3 | 41.3 | 75.9 | 0.0 | 0.0 |
| 107.00 | 41.3 | 26.5 | 0.0 | 49.3 | 41.3 | 75.8 | 0.0 | 0.0 |
| 107.50 | 41.2 | 26.4 | 0.0 | 49.3 | 41.2 | 75.7 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | ¢0007-2018 by ATC IP LLC. All rights reserved. |
| :---: | :---: | :---: | :---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | 4/24/2018 5:53:55 PM |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ |  |  | 101 mph with No Ice (Reduced DL) |  |  |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Dead Load Factor: 0.90 <br> Wind Load Factor : 1.60 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 108.00 |  | 41.1 | 26.3 |  |  |  |  | 0.0 | 49.3 | 41.1 | 75.6 | 0.0 | 0.0 |
| 108.50 |  | 41.0 | 26.2 |  |  |  |  | 0.0 | 49.3 | 41.0 | 75.5 | 0.0 | 0.0 |
| 109.00 |  | 40.9 | 26.1 |  |  |  |  | 0.0 | 49.3 | 40.9 | 75.4 | 0.0 | 0.0 |
| 109.50 |  | 40.8 | 26.1 |  |  |  |  | 0.0 | 49.3 | 40.8 | 75.3 | 0.0 | 0.0 |
| 110.00 | Top - Section 3 | 40.7 | 26.0 |  |  |  |  | 0.0 | 49.3 | 40.7 | 75.2 | 0.0 | 0.0 |
| 110.50 |  | 40.6 | 19.5 |  |  |  |  | 0.0 | 43.5 | 40.6 | 62.9 | 0.0 | 0.0 |
| 111.00 |  | 40.5 | 19.4 |  |  |  |  | 0.0 | 43.5 | 40.5 | 62.9 | 0.0 | 0.0 |
| $111.50$ |  | 40.4 | 19.3 |  |  |  |  | 0.0 | 43.5 | 40.4 | 62.8 | 0.0 | 0.0 |
| $112.00$ |  | 40.3 | 19.2 |  |  |  |  | 0.0 | 43.5 | 40.3 | 62.7 | 0.0 | 0.0 |
| 112.50 |  | 40.2 | 19.2 |  |  |  |  | 0.0 | 43.5 | 40.2 | 62.6 | 0.0 | 0.0 |
| 113.00 |  | 40.1 | 19.1 |  |  |  |  | 0.0 | 43.5 | 40.1 | 62.6 | 0.0 | 0.0 |
| 113.50 |  | 40.0 | 19.0 |  |  |  |  | 0.0 | 43.5 | 40.0 | 62.5 | 0.0 | 0.0 |
| $114.00$ |  | 39.9 | 18.9 |  |  |  |  | 0.0 | 43.5 | 39.9 | 62.4 | 0.0 | 0.0 |
| $114.50$ |  | 39.8 | 18.9 |  |  |  |  | 0.0 | 43.5 | 39.8 | 62.4 | 0.0 | 0.0 |
| $115.00$ |  | $39.7$ | 18.8 |  |  |  |  | 0.0 | 43.5 | 39.7 | 62.3 | 0.0 | 0.0 |
| $115.50$ |  | 39.6 | 18.7 |  |  |  |  | 0.0 | 43.5 | $39.6$ | 62.2 | 0.0 | 0.0 |
| $116.00$ |  | 39.5 | 18.7 |  |  |  |  | 0.0 | 43.5 | 39.5 | 62.1 | 0.0 | 0.0 |
| $116.50$ | Reinf. Top | 39.4 | 18.6 |  |  |  |  | 0.0 | 43.5 | 39.4 | 62.1 | 0.0 | 0.0 |
| $117.00$ |  | 39.3 | 18.5 |  |  |  |  | 0.0 | 20.5 | 39.3 | 39.0 | 0.0 | 0.0 |
| $117.50$ |  | 39.2 | 18.4 |  |  |  |  | 0.0 | 20.5 | 39.2 | 39.0 | 0.0 | 0.0 |
| $118.00$ |  | $39.1$ | $18.4$ |  |  |  |  | 0.0 | 20.5 | 39.1 | 38.9 | 0.0 | 0.0 |
| $118.50$ |  | $39.0$ | $18.3$ |  |  |  |  | 0.0 | 20.5 | 39.0 | 38.8 | 0.0 | 0.0 |
| $119.00$ |  | 38.8 | 18.2 |  |  |  |  | 0.0 | 20.5 | 38.8 | 38.7 | 0.0 | 0.0 |
| 119.50 |  | 38.7 | 18.1 |  |  |  |  | 0.0 | 20.5 | 38.7 | 38.7 | 0.0 | 0.0 |
| $120.00$ |  | 38.6 | 18.1 |  |  |  |  | 0.0 | 20.5 | 38.6 | 38.6 | 0.0 | 0.0 |
| $120.50$ |  | $38.5$ | $18.0$ |  |  |  |  | 0.0 | 20.5 | 38.5 | 38.5 | 0.0 | 0.0 |
| $121.00$ |  | $38.4$ | 17.9 |  |  |  |  | 0.0 | 20.5 | 38.4 | 38.5 | 0.0 | 0.0 |
| $121.50$ |  | $38.3$ | 17.9 |  |  |  |  | 0.0 | 20.5 | 38.3 | 38.4 | 0.0 | 0.0 |
| $122.00$ |  | $38.2$ | $17.8$ |  |  |  |  | 0.0 | 20.5 | 38.2 | 38.3 | 0.0 | 0.0 |
| $122.50$ |  | $38.1$ | 17.7 |  |  |  |  | 0.0 | 20.5 | 38.1 | 38.2 | 0.0 | 0.0 |
| $123.00$ |  | $38.0$ | 17.6 |  |  |  |  | 0.0 | 20.5 | 38.0 | 38.2 | 0.0 | 0.0 |
| $123.50$ |  | 37.9 | 17.6 |  |  |  |  | 0.0 | 20.5 | 37.9 | 38.1 | 0.0 | 0.0 |
| $124.00$ |  | $37.8$ | 17.5 |  |  |  |  | 0.0 | 20.5 | 37.8 | 38.0 | 0.0 | 0.0 |
| $124.50$ |  | $37.6$ | $17.4$ |  |  |  |  | 0.0 | 20.5 | 37.6 | 37.9 | 0.0 | 0.0 |
| $125.00$ |  | 37.5 | 17.4 |  |  |  |  | 0.0 | 20.5 | 37.5 | 37.9 | 0.0 | 0.0 |
| 125.50 |  | 37.4 | 17.3 |  |  |  |  | 0.0 | 20.5 | 37.4 | 37.8 | 0.0 | 0.0 |
| $126.00$ |  | 37.3 | 17.2 |  |  |  |  | 0.0 | 20.5 | 37.3 | 37.7 | 0.0 | 0.0 |
| $126.50$ |  | $37.2$ | 17.1 |  |  |  |  | 0.0 | 20.5 | 37.2 | 37.7 | 0.0 | 0.0 |
| $127.00$ |  | 37.1 | $17.1$ |  |  |  |  | 0.0 | 20.5 | 37.1 | 37.6 | 0.0 | 0.0 |
| 127.50 |  | 37.0 | 17.0 |  |  |  |  | 0.0 | 20.5 | 37.0 | 37.5 | 0.0 | 0.0 |
| 128.00 |  | 36.8 | 16.9 |  |  |  |  | 0.0 | 20.5 | 36.8 | 37.4 | 0.0 | 0.0 |
| 128.50 |  | 36.7 | 16.8 |  |  |  |  | 0.0 | 20.5 | 36.7 | 37.4 | 0.0 | 0.0 |
| $129.00$ |  | 36.6 | 16.8 |  |  |  |  | 0.0 | 20.5 | 36.6 | 37.3 | 0.0 | 0.0 |
| $129.50$ |  | 36.5 | 16.7 |  |  |  |  | 0.0 | 20.5 | 36.5 | 37.2 | 0.0 | 0.0 |
| $130.00$ |  | 36.4 | 16.6 |  |  |  |  | 0.0 | 20.5 | 36.4 | 37.1 | 0.0 | 0.0 |
| $130.50$ |  | 36.3 | 16.6 |  |  |  |  | 0.0 | 20.5 | 36.3 | 37.1 | 0.0 | 0.0 |
| $131.00$ | Appurtenance(s) | $36.1$ | $16.5$ | 3,718.4 | 0.0 | 0.0 | 2,873.0 | 0.0 | 20.5 | 3,754.5 | $2,910.0$ | 0.0 | 0.0 |
| $131.50$ |  | 36.0 | $16.4$ |  |  |  |  | 0.0 | 15.3 | $36.0$ | $31.7$ | 0.0 | 0.0 |
| $\begin{aligned} & 132.00 \\ & 132.50 \end{aligned}$ |  | $35.9$ | $16.3$ |  |  |  |  | 0.0 | 15.3 | $35.9$ | $31.7$ | 0.0 | 0.0 |
| $\begin{aligned} & 132.50 \\ & 133.00 \end{aligned}$ |  | $35.8$ | 16.3 |  |  |  |  | 0.0 | 15.3 | 35.8 | $31.6$ | 0.0 | 0.0 |
|  |  | 35.7 35.5 | 16.2 |  |  |  |  | 0.0 | 15.3 | 35.7 | 31.5 | 0.0 | 0.0 |
| 134.00 |  | 35.5 35.4 | 16.1 16.0 |  |  |  |  | 0.0 0.0 | 15.3 15.3 | 35.5 35.4 | 31.4 31.4 | 0.0 0.0 | 0.0 0.0 |
| 134.50 |  | 35.3 | 16.0 |  |  |  |  | 0.0 | 15.3 | 35.3 | 31.3 | 0.0 | 0.0 |
| 135.00 |  | 35.2 | 15.9 |  |  |  |  | 0.0 | 15.3 | 35.2 | 31.2 | 0.0 | 0.0 |
| 135.50 |  | 35.1 | 15.8 |  |  |  |  | 0.0 | 15.3 | 35.1 | 31.1 | 0.0 | 0.0 |
| 136.00 |  | 34.9 | 15.8 |  |  |  |  | 0.0 | 15.3 | 34.9 | 31.1 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:53:55 PM |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ |  |  | 101 mph with No Ice (Reduced DL) |  |  |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 |  |  |  |  |  |  |  |  |  | Wind Importance Factor : 1.00 |  |  |  |
| Dead Load Factor: 0.90 <br> Wind Load Factor : 1.60 |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 136.50 |  | 34.8 | 15.7 |  |  |  |  | 0.0 | 15.3 | 34.8 | 31.0 | 0.0 | 0.0 |
| 137.00 |  | 34.7 | 15.6 |  |  |  |  | 0.0 | 15.3 | 34.7 | 30.9 | 0.0 | 0.0 |
| 137.50 |  | 34.6 | 15.5 |  |  |  |  | 0.0 | 15.3 | 34.6 | 30.9 | 0.0 | 0.0 |
| 138.00 |  | 34.4 | 15.5 |  |  |  |  | 0.0 | 15.3 | 34.4 | 30.8 | 0.0 | 0.0 |
| 138.50 |  | 34.3 | 15.4 |  |  |  |  | 0.0 | 15.3 | 34.3 | 30.7 | 0.0 | 0.0 |
| 139.00 |  | 34.2 | 15.3 |  |  |  |  | 0.0 | 15.3 | 34.2 | 30.6 | 0.0 | 0.0 |
| 139.50 |  | 34.1 | 15.3 |  |  |  |  | 0.0 | 15.3 | 34.1 | 30.6 | 0.0 | 0.0 |
| 140.00 |  | 33.9 | 15.2 |  |  |  |  | 0.0 | 15.3 | 33.9 | 30.5 | 0.0 | 0.0 |
| 140.50 (s) |  | 33.8 | 15.1 |  |  |  |  | 0.0 | 15.3 | 33.8 | 30.4 | 0.0 | 0.0 |
| 141.00 Appurtenance(s)141.50 |  | 33.7 | 15.0 | 487.5 | 0.0 | 0.0 | 59.4 | 0.0 | 15.3 | 521.2 | 89.8 | 0.0 | 0.0 |
|  |  | 33.6 | 15.0 |  |  |  |  | 0.0 | 13.1 | 33.6 | 28.1 | 0.0 | 0.0 |
| 142.00 |  | 33.4 | 14.9 |  |  |  |  | 0.0 | 13.1 | 33.4 | 28.0 | 0.0 | 0.0 |
| 142.50 |  | 33.3 | 14.8 |  |  |  |  | 0.0 | 13.1 | 33.3 | 27.9 | 0.0 | 0.0 |
| 143.00 |  | 33.2 | 14.7 |  |  |  |  | 0.0 | 13.1 | 33.2 | 27.8 | 0.0 | 0.0 |
| 143.50 |  | 33.1 | 14.7 |  |  |  |  | 0.0 | 13.1 | 33.1 | 27.8 | 0.0 | 0.0 |
| 144.00 |  | 32.9 | 14.6 |  |  |  |  | 0.0 | 13.1 | 32.9 | 27.7 | 0.0 | 0.0 |
| 144.50 |  | 32.8 | 14.5 |  |  |  |  | 0.0 | 13.1 | 32.8 | 27.6 | 0.0 | 0.0 |
| 145.00 |  | 32.7 | 14.5 |  |  |  |  | 0.0 | 13.1 | 32.7 | 27.6 | 0.0 | 0.0 |
| 145.50 |  | 32.5 | 14.4 |  |  |  |  | 0.0 | 13.1 | 32.5 | 27.5 | 0.0 | 0.0 |
| 146.00 |  | 32.4 | 14.3 |  |  |  |  | 0.0 | 13.1 | 32.4 | 27.4 | 0.0 | 0.0 |
| 146.50 |  | 32.3 | 14.2 |  |  |  |  | 0.0 | 13.1 | 32.3 | 27.3 | 0.0 | 0.0 |
| 147.00 |  | 32.1 | 14.2 |  |  |  |  | 0.0 | 13.1 | 32.1 | 27.3 | 0.0 | 0.0 |
| 147.50 |  | 32.0 | 14.1 |  |  |  |  | 0.0 | 13.1 | 32.0 | 27.2 | 0.0 | 0.0 |
| 148.00 |  | 31.9 | 14.0 |  |  |  |  | 0.0 | 13.1 | 31.9 | 27.1 | 0.0 | 0.0 |
| 148.50 |  | 31.7 | 13.9 |  |  |  |  | 0.0 | 13.1 | 31.7 | 27.1 | 0.0 | 0.0 |
| 149.00 |  | 31.6 | 13.9 |  |  |  |  | 0.0 | 13.1 | 31.6 | 27.0 | 0.0 | 0.0 |
| 149.50 |  | 31.5 | 13.8 |  |  |  |  | 0.0 | 13.1 | 31.5 | 26.9 | 0.0 | 0.0 |
| 150.00 | Appurtenance(s) | 15.7 | 13.7 | 4,086.5 |  | 11,852.0 | 3,132.0 | 0.0 | 13.1 | 4,102.2 | 3,158.8 | 0.0 | 0.0 |
|  |  |  |  |  |  |  |  |  |  | 21,121.4 | 31,566.1 | 0.00 | 0.00 |

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Customer: SPRINT NEXTEL

| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ | 101 mph with No Ice (Reduced DL) |
| :--- | :---: |
| Gust Response Factor: 1.10 |  |
| Dead Load Factor: 0.90 | Wind Importance Factor : 1.00 |
| Wind Load Factor : 1.60 |  |

Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{gathered} \mathrm{Pu} \\ \mathrm{FY}(-) \\ \text { (kips) } \\ \hline \end{gathered}$ | $\begin{aligned} & \mathrm{Vu} \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ | Tu MY (ft-kips) |  | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | $\begin{gathered} \text { phi } \\ \text { Pn } \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ \text { Vn } \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ \text { Tn } \\ \text { (ft-kips) } \\ \hline \end{gathered}$ |  | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -31.56 | -21.10 | 0.00 | -2,203.30 | 0.00 | 2,203.30 | 3,157.17 | ,578.58 | 4,812 | 2,376.61 | 0.00 | 0.00 | 0.574 |
| 0.50 | -31.44 | -21.07 | 0.00 | -2,192.75 | 0.00 | 2,192.75 | 3,152.93 | 1,576.47 | 4,795.55 | 2,368.34 | 0.00 | -0.02 | 0.573 |
| 1.00 | -31.33 | -21.03 | 0.00 | -2,182.22 | 0.00 | 2,182.22 | 3,148.69 | 1,574.34 | 4,778.83 | 2,360.09 | 0.01 | -0.05 | 0.571 |
| 1.50 | -31.21 | -21.00 | 0.00 | -2,171.70 | 0.00 | 2,171.70 | 3,144.43 | 1,572.22 | 4,762.13 | 2,351.84 | 0.01 | -0.07 | 0.570 |
| 2.00 | -31.09 | -20.96 | 0.00 | -2,161.20 | 0.00 | 2,161.20 | 3,140.17 | 1,570.08 | 4,745.43 | 2,343.59 | 0.02 | -0.10 | 0.569 |
| 2.50 | -30.98 | -20.92 | 0.00 | -2,150.72 | 0.00 | 2,150.72 | 3,135.89 | 1,567.94 | 4,728.75 | 2,335.35 | 0.03 | -0.12 | 0.567 |
| 3.00 | -30.86 | -20.89 | 0.00 | -2,140.26 | 0.00 | 2,140.26 | 3,131.60 | 1,565.80 | 4,712.08 | 2,327.12 | 0.05 | -0.15 | 0.566 |
| 3.50 | -30.74 | -20.85 | 0.00 | -2,129.82 | 0.00 | 2,129.82 | 3,127.31 | 1,563.65 | 4,695.42 | 2,318.89 | 0.06 | -0.17 | 0.565 |
| 4.00 | -30.63 | -20.82 | 0.00 | -2,119.39 | 0.00 | 2,119.39 | 3,123.00 | 1,561.50 | 4,678.77 | 2,310.67 | 0.08 | -0.20 | 0.564 |
| 4.50 | -30.51 | -20.78 | 0.00 | -2,108.98 | 0.00 | 2,108.98 | 3,118.68 | 1,559.34 | 4,662.14 | 2,302.45 | 0.11 | -0.22 | 0.562 |
| 5.00 | -30.39 | -20.75 | 0.00 | -2,098.59 | 0.00 | 2,098.59 | 3,114.35 | 1,557.18 | 4,645.51 | 2,294.24 | 0.13 | -0.25 | 0.561 |
| 5.50 | -30.28 | -20.71 | 0.00 | $-2,088.22$ | 0.00 | 2,088.22 | 3,110.02 | 1,555.01 | 4,628.91 | 2,286.04 | 0.16 | -0.27 | 0.560 |
| 6.00 | -30.16 | -20.67 | 0.00 | -2,077.87 | 0.00 | 2,077.87 | 3,105.67 | 1,552.83 | 4,612.31 | 2,277.85 | 0.19 | -0.30 | 0.558 |
| 6.50 | -30.05 | -20.64 | 0.00 | -2,067.53 | 0.00 | 2,067.53 | 3,101.31 | 1,550.65 | 4,595.73 | 2,269.66 | 0.22 | -0.32 | 0.557 |
| 7.00 | -29.93 | -20.60 | 0.00 | -2,057.21 | 0.00 | 2,057.21 | 3,096.94 | 1,548.47 | 4,579.16 | 2,261.47 | 0.25 | -0.34 | 0.556 |
| 7.50 | -29.82 | -20.57 | 0.00 | -2,046.91 | 0.00 | 2,046.91 | 3,092.56 | 1,546.28 | 4,562.60 | 2,253.30 | 0.29 | -0.37 | 0.554 |
| 8.00 | -29.70 | -20.53 | 0.00 | -2,036.63 | 0.00 | 2,036.63 | 3,088.17 | 1,544.08 | 4,546.06 | 2,245.13 | 0.33 | -0.39 | 0.553 |
| 8.50 | -29.57 | -20.50 | 0.00 | -2,026.36 | 0.00 | 2,026.36 | 3,083.77 | 1,541.88 | 4,529.53 | 2,236.96 | 0.38 | -0.42 | 0.552 |
| 9.00 | -29.43 | -20.46 | 0.00 | $-2,016.11$ | 0.00 | 2,016.11 | 3,079.36 | 1,539.68 | 4,513.01 | 2,228.81 | 0.42 | -0.44 | 0.550 |
| 9.50 | -29.30 | -20.43 | 0.00 | -2,005.88 | 0.00 | 2,005.88 | 3,074.94 | 1,537.47 | 4,496.51 | 2,220.66 | 0.47 | -0.47 | 0.549 |
| 10.00 | -29.16 | -20.39 | 0.00 | $-1,995.67$ | 0.00 | 1,995.67 | 3,070.50 | 1,535.25 | 4,480.02 | 2,212.51 | 0.52 | -0.49 | 0.548 |
| 10.50 | -29.03 | -20.35 | 0.00 | -1,985.47 | 0.00 | 1,985.47 | 3,066.06 | 1,533.03 | 4,463.54 | 2,204.38 | 0.57 | -0.52 | 0.546 |
| 11.00 | -28.89 | -20.32 | 0.00 | -1,975.30 | 0.00 | 1,975.30 | 3,061.61 | 1,530.80 | 4,447.08 | 2,196.25 | 0.63 | -0.54 | 0.545 |
| 11.50 | -28.76 | -20.28 | 0.00 | -1,965.14 | 0.00 | 1,965.14 | 3,057.15 | 1,528.57 | 4,430.63 | 2,188.12 | 0.69 | -0.57 | 0.544 |
| 12.00 | -28.62 | -20.25 | 0.00 | -1,955.00 | 0.00 | 1,955.00 | 3,052.67 | 1,526.34 | 4,414.20 | 2,180.01 | 0.75 | -0.59 | 0.542 |
| 12.50 | -28.49 | -20.21 | 0.00 | -1,944.87 | 0.00 | 1,944.87 | 3,048.19 | 1,524.09 | 4,397.78 | 2,171.90 | 0.81 | -0.62 | 0.541 |
| 13.00 | -28.36 | -20.18 | 0.00 | -1,934.77 | 0.00 | 1,934.77 | 3,043.69 | 1,521.85 | 4,381.37 | 2,163.80 | 0.88 | -0.64 | 0.540 |
| 13.50 | -28.22 | -20.14 | 0.00 | -1,924.68 | 0.00 | 1,924.68 | 3,039.19 | 1,519.59 | 4,364.98 | 2,155.70 | 0.95 | -0.67 | 0.538 |
| 14.00 | -28.09 | -20.10 | 0.00 | -1,914.61 | 0.00 | 1,914.61 | 3,034.67 | 1,517.34 | 4,348.61 | 2,147.61 | 1.02 | -0.69 | 0.537 |
| 14.50 15.00 | -27.96 -27.82 | -20.07 -20.03 | 0.00 0.00 | $-1,904.56$ $-1,894.53$ | 0.00 0.00 | $1,904.56$ 1,894 $1,884.51$ | $3,030.15$ 3,0251 | 1,515.07 | $4,332.24$ 4 4 | 2,139.53 | 1.09 | -0.72 -0.74 | 0.536 0.534 0.533 |
| 15.50 | -27.89 | -20.03 | 0.00 | -1,894.53 | 0.00 0.00 | $1,894.53$ $1,884.51$ | $3,025.61$ $3,021.07$ | 1,512.81 | $4,315.90$ $4,299.57$ | 2,131.46 | 1.17 1.25 | -0.74 -0.77 | 0.534 0.533 |
| 16.00 | -27.56 | -19.96 | 0.00 | -1,874.51 | 0.00 | 1,874.51 | 3,016.51 | 1,508.25 | 4,283.25 | 2,115.33 | 1.33 | -0.79 | 0.532 |
| 16.50 | -27.43 | -19.93 | 0.00 | -1,864.53 | 0.00 | 1,864.53 | 3,011.94 | 1,505.97 | 4,266.95 | 2,107.28 | 1.41 | -0.82 | 0.530 |
| 17.00 | -27.29 | -19.89 | 0.00 | -1,854.57 | 0.00 | 1,854.57 | 3,007.37 | 1,503.68 | 4,250.66 | 2,099.24 | 1.50 | -0.84 | 0.529 |
| 17.50 | -27.16 | -19.85 | 0.00 | -1,844.62 | 0.00 | 1,844.62 | 3,002.78 | 1,501.39 | 4,234.39 | 2,091.20 | 1.59 | -0.87 | 0.527 |
| 18.00 | -27.03 | -19.82 | 0.00 | -1,834.69 | 0.00 | 1,834.69 | 2,998.18 | 1,499.09 | 4,218.13 | 2,083.18 | 1.68 | -0.89 | 0.526 |
| 18.50 | -26.90 | -19.78 | 0.00 | -1,824.79 | 0.00 | 1,824.79 | 2,993.57 | 1,496.79 | 4,201.89 | 2,075.15 | 1.78 | -0.92 | 0.525 |
| 19.00 | -26.77 | -19.75 | 0.00 | -1,814.89 | 0.00 | 1,814.89 | 2,988.95 | 1,494.48 | 4,185.66 | 2,067.14 | 1.87 | -0.94 | 0.523 |
| 19.50 | -26.64 | -19.71 | 0.00 | -1,805.02 | 0.00 | 1,805.02 | 2,984.32 | 1,492.16 | 4,169.45 | 2,059.13 | 1.97 | -0.97 | 0.522 |
| 20.00 | -26.50 | -19.68 | 0.00 | -1,795.17 | 0.00 | 1,795.17 | 2,979.68 | 1,489.84 | 4,153.25 | 2,051.14 | 2.08 | -0.99 | 0.521 |
| 20.50 | -26.37 | -19.64 | 0.00 | -1,785.33 | 0.00 | 1,785.33 | 2,975.03 | 1,487.52 | 4,137.08 | 2,043.15 | 2.18 | -1.02 | 0.519 |
| 21.00 | -26.24 | -19.60 | 0.00 | $-1,775.51$ | 0.00 | 1,775.51 | 2,970.37 | 1,485.19 | 4,120.91 | 2,035.16 | 2.29 | -1.04 | 0.518 |
| 21.50 | -26.11 | -19.57 | 0.00 | $-1,765.70$ | 0.00 | 1,765.70 | 2,965.70 | 1,482.85 | 4,104.77 | 2,027.19 | 2.40 | -1.07 | 0.516 |
| 22.00 | -25.98 | -19.53 | 0.00 | -1,755.92 | 0.00 | 1,755.92 | 2,961.02 | 1,480.51 | 4,088.63 | 2,019.22 | 2.51 | -1.09 | 0.515 |
| 22.50 | -25.85 | -19.50 | 0.00 | -1,746.15 | 0.00 | 1,746.15 | 2,956.33 | 1,478.16 | 4,072.52 | 2,011.26 | 2.63 | -1.12 | 0.514 |
| 23.00 | -25.72 | -19.46 | 0.00 | -1,736.41 | 0.00 | 1,736.41 | 2,951.62 | 1,475.81 | 4,056.42 | 2,003.31 | 2.75 | -1.14 | 0.512 |
| 23.50 | -25.59 | -19.43 | 0.00 | -1,726.67 | 0.00 | 1,726.67 | 2,946.91 | 1,473.46 | 4,040.34 | 1,995.37 | 2.87 | -1.17 | 0.511 |
| 24.00 | -25.46 | -19.39 | 0.00 | -1,716.96 | 0.00 | 1,716.96 | 2,942.19 | 1,471.09 | 4,024.27 | 1,987.44 | 2.99 | -1.19 | 0.509 |
| 24.50 | -25.33 | -19.35 | 0.00 | -1,707.27 | 0.00 | 1,707.27 | 2,937.46 | 1,468.73 | 4,008.22 | 1,979.51 | 3.12 | -1.22 | 0.508 |
| 25.00 | -25.20 | -19.32 | 0.00 | -1,697.59 | 0.00 | 1,697.59 | 2,932.71 | 1,466.36 | 3,992.19 | 1,971.59 | 3.25 | -1.24 | 0.507 |

Site Number: 302494

Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL


Customer: SPRINT NEXTEL


Site Number: 302494
Code: ANSI/TIA-222-G
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Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:53:55 PM
Customer: SPRINT NEXTEL

| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ |  |  |  | 101 mph with No Ice (Reduced DL) |  |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{aligned} \text { Gust Response Factor : } & 1.10 \\ \text { Dead Load Factor : } & 0.90 \\ \text { Wind Load Factor : } & 1.60 \end{aligned}$ |  |  |  |  |  |  |  |  |  | Wind Imp | rtance F | actor : | . 00 |
| 80.00 | -12.71 | -14.75 | 0.00 | -754.24 | 0.00 | 754.24 | 1,440.00 | 720.00 | 1,526.12 | 753.69 | 34.63 | -4.28 | 0.504 |
| 80.50 | -12.62 | -14.71 | 0.00 | -746.87 | 0.00 | 746.87 | 1,437.32 | 718.66 | 1,518.59 | 749.97 | 35.08 | -4.31 | 0.501 |
| 81.00 | -12.54 | -14.67 | 0.00 | -739.51 | 0.00 | 739.51 | 1,434.62 | 717.31 | 1,511.06 | 746.26 | 35.53 | -4.34 | 0.497 |
| 81.50 | -12.46 | -14.62 | 0.00 | -732.18 | 0.00 | 732.18 | 1,431.91 | 715.96 | 1,503.54 | 742.54 | 35.99 | -4.37 | 0.494 |
| 82.00 | -12.37 | -14.58 | 0.00 | -724.87 | 0.00 | 724.87 | 1,429.20 | 714.60 | 1,496.03 | 738.83 | 36.44 | -4.40 | 0.491 |
| 82.50 | -12.29 | -14.53 | 0.00 | -717.58 | 0.00 | 717.58 | 1,426.47 | 713.23 | 1,488.53 | 735.13 | 36.91 | -4.43 | 0.487 |
| 83.00 | -12.20 | -14.49 | 0.00 | -710.32 | 0.00 | 710.32 | 1,423.73 | 711.87 | 1,481.03 | 731.43 | 37.37 | -4.46 | 0.484 |
| 83.50 | -12.12 | -14.44 | 0.00 | -703.07 | 0.00 | 703.07 | 1,420.98 | 710.49 | 1,473.54 | 727.73 | 37.84 | -4.49 | 0.481 |
| 84.00 | -12.03 | -14.40 | 0.00 | -695.85 | 0.00 | 695.85 | 1,418.23 | 709.11 | 1,466.06 | 724.03 | 38.31 | -4.52 | 0.477 |
| 84.50 | -11.95 | -14.35 | 0.00 | -688.65 | 0.00 | 688.65 | 1,415.46 | 707.73 | 1,458.58 | 720.34 | 38.79 | -4.55 | 0.474 |
| 85.00 | -11.87 | -14.31 | 0.00 | -681.48 | 0.00 | 681.48 | 1,412.68 | 706.34 | 1,451.11 | 716.65 | 39.26 | -4.58 | 0.471 |
| 85.50 | -11.78 | -14.26 | 0.00 | -674.32 | 0.00 | 674.32 | 1,409.89 | 704.94 | 1,443.65 | 712.97 | 39.74 | -4.61 | 0.467 |
| 86.00 | -11.70 | -14.22 | 0.00 | -667.19 | 0.00 | 667.19 | 1,407.09 | 703.54 | 1,436.20 | 709.28 | 40.23 | -4.64 | 0.464 |
| 86.50 | -11.62 | -14.17 | 0.00 | -660.08 | 0.00 | 660.08 | 1,404.28 | 702.14 | 1,428.75 | 705.61 | 40.71 | -4.67 | 0.460 |
| 87.00 | $-11.53$ | $-14.13$ | 0.00 | $-652.99$ | 0.00 | 652.99 | 1,401.46 | 700.73 | 1,421.32 | 701.93 | 41.20 | -4.69 | 0.457 |
| 87.50 | -11.45 | -14.08 | 0.00 | -645.93 | 0.00 | 645.93 | 1,398.63 | 699.31 | 1,413.89 | 698.26 | 41.70 | -4.72 | 0.454 |
| 88.00 | -11.37 | -14.04 | 0.00 | -638.89 | 0.00 | 638.89 | 1,395.79 | 697.89 | 1,406.46 | 694.60 | 42.19 | -4.75 | 0.450 |
| 88.50 | -11.28 | -13.99 | 0.00 | -631.87 | 0.00 | 631.87 | 1,392.93 | 696.47 | 1,399.05 | 690.94 | 42.69 | -4.78 | 0.447 |
| 89.00 | -11.20 | -13.95 | 0.00 | -624.87 | 0.00 | 624.87 | 1,390.07 | 695.04 | 1,391.64 | 687.28 | 43.19 | -4.81 | 0.443 |
| 89.50 | -11.12 | -13.90 | 0.00 | -617.90 | 0.00 | 617.90 | 1,387.20 | 693.60 | 1,384.25 | 683.63 | 43.70 | -4.84 | 0.440 |
| 90.00 | -11.04 | -13.86 | 0.00 | -610.95 | 0.00 | 610.95 | 1,384.32 | 692.16 | 1,376.86 | 679.98 | 44.21 | -4.87 | 0.436 |
| 90.50 | -10.96 | -13.81 | 0.00 | -604.02 | 0.00 | 604.02 | 1,381.42 | 690.71 | 1,369.48 | 676.33 | 44.72 | -4.90 | 0.433 |
| 91.00 | -10.87 | -13.77 | 0.00 | -597.11 | 0.00 | 597.11 | 1,378.52 | 689.26 | 1,362.10 | 672.69 | 45.23 | -4.93 | 0.430 |
| 91.50 | -10.79 | -13.72 | 0.00 | -590.23 | 0.00 | 590.23 | 1,375.61 | 687.80 | 1,354.74 | 669.06 | 45.75 | -4.95 | 0.426 |
| 92.00 | -10.71 | -13.68 | 0.00 | -583.37 | 0.00 | 583.37 | 1,372.68 | 686.34 | 1,347.39 | 665.42 | 46.27 | -4.98 | 0.423 |
| 92.50 | -10.63 | -13.63 | 0.00 | -576.53 | 0.00 | 576.53 | 1,369.75 | 684.87 | 1,340.04 | 661.80 | 46.79 | -5.01 | 0.419 |
| 93.00 | -10.55 | -13.59 | 0.00 | -569.71 | 0.00 | 569.71 | 1,366.80 | 683.40 | 1,332.70 | 658.17 | 47.32 | -5.04 | 0.416 |
| 93.50 | -10.47 | -13.54 | 0.00 | -562.92 | 0.00 | 562.92 | 1,363.85 | 681.92 | 1,325.38 | 654.55 | 47.85 | -5.07 | 0.412 |
| 94.00 | -10.39 | -13.50 | 0.00 | -556.15 | 0.00 | 556.15 | 1,360.88 | 680.44 | 1,318.06 | 650.94 | 48.38 | -5.10 | 0.409 |
| 94.50 | -10.31 | -13.45 | 0.00 | -549.40 | 0.00 | 549.40 | 1,357.90 | 678.95 | 1,310.75 | 647.33 | 48.91 | -5.12 | 0.405 |
| 95.00 | -10.23 | -13.41 | 0.00 | -542.67 | 0.00 | 542.67 | 1,354.92 | 677.46 | 1,303.45 | 643.72 | 49.45 | -5.15 | 0.402 |
| 95.50 | -10.15 | -13.36 | 0.00 | -535.97 | 0.00 | 535.97 | 1,351.92 | 675.96 | 1,296.16 | 640.12 | 49.99 | -5.18 | 0.398 |
| 96.00 | -10.07 | -13.32 | 0.00 | -529.29 | 0.00 | 529.29 | 1,348.91 | 674.46 | 1,288.88 | 636.53 | 50.53 | -5.21 | 0.395 |
| 96.50 | -9.99 | -13.27 | 0.00 | -522.63 | 0.00 | 522.63 | 1,345.89 | 672.95 | 1,281.61 | 632.94 | 51.08 | -5.23 | 0.391 |
| 97.00 | -9.91 | -13.23 | 0.00 | -515.99 | 0.00 | 515.99 | 1,342.86 | 671.43 | 1,274.35 | 629.35 | 51.63 | -5.26 | 0.387 |
| 97.50 | -9.83 | -13.18 | 0.00 | -509.38 | 0.00 | 509.38 | 1,339.82 | 669.91 | 1,267.09 | 625.77 | 52.18 | -5.29 | 0.384 |
| 98.00 | -9.75 | -13.14 | 0.00 | -502.79 | 0.00 | 502.79 | 1,336.78 | 668.39 | 1,259.85 | 622.19 | 52.74 | -5.31 | 0.380 |
| 98.50 | -9.67 | -13.09 | 0.00 | -496.22 | 0.00 | 496.22 | 1,333.72 | 666.86 | 1,252.62 | 618.62 | 53.29 | -5.34 | 0.377 |
| 99.00 | -9.59 | -13.05 | 0.00 | -489.68 | 0.00 | 489.68 | 1,330.65 | 665.32 | 1,245.40 | 615.06 | 53.85 | -5.37 | 0.373 |
| 99.50 | -9.51 | -13.00 | 0.00 | -483.16 | 0.00 | 483.16 | 1,327.57 | 663.78 | 1,238.19 | 611.50 | 54.42 | -5.39 | 0.369 |
| 100.00 | -9.43 | -12.95 | 0.00 | -476.66 | 0.00 | 476.66 | 1,324.47 | 662.24 | 1,230.99 | 607.94 | 54.98 | -5.42 | 0.366 |
| 100.50 | -9.35 | -12.91 | 0.00 | -470.18 | 0.00 | 470.18 | 1,321.37 | 660.69 | 1,223.80 | 604.39 | 55.55 | -5.45 | 0.362 |
| 101.00 | -9.28 | -12.86 | 0.00 | -463.72 | 0.00 | 463.72 | 1,318.26 | 659.13 | 1,216.62 | 600.84 | 56.12 | -5.47 | 0.359 |
| 101.50 | -9.20 | -12.82 | 0.00 | -457.29 | 0.00 | 457.29 | 1,315.14 | 657.57 | 1,209.45 | 597.30 | 56.70 | -5.50 | 0.355 |
| 102.00 | -9.12 | -12.77 | 0.00 | -450.88 | 0.00 | 450.88 | 1,312.01 | 656.00 | 1,202.30 | 593.77 | 57.27 | -5.53 | 0.351 |
| 102.50 | -9.04 | -12.73 | 0.00 | -444.50 | 0.00 | 444.50 | 1,308.86 | 654.43 | 1,195.15 | 590.24 | 57.85 | -5.55 | 0.348 |
| 103.00 | -8.96 | -12.68 | 0.00 | -438.13 | 0.00 | 438.13 | 1,305.71 | 652.86 | 1,188.02 | 586.72 | 58.43 | -5.58 | 0.344 |
| 103.50 | -8.89 | -12.64 | 0.00 | -431.79 | 0.00 | 431.79 | 1,302.55 | 651.27 | 1,180.89 | 583.20 | 59.02 | -5.60 | 0.340 |
| 104.00 | -8.81 | -12.59 | 0.00 | -425.47 | 0.00 | 425.47 | $1,299.37$ | 649.69 | 1,173.78 | 579.69 | 59.61 | -5.63 | 0.337 |
| 104.50 | -8.73 | -12.55 | 0.00 | -419.18 | 0.00 | 419.18 | 1,296.19 | 648.09 | 1,166.68 | 576.18 | 60.20 | -5.65 | 0.333 |
| 105.00 | -8.65 | -12.50 | 0.00 | -412.90 | 0.00 | 412.90 | 1,292.99 | 646.50 | 1,159.59 | 572.68 | 60.79 | -5.68 | 0.329 |
| 105.50 | -8.58 | -12.46 | 0.00 | -406.65 | 0.00 | 406.65 | 1,288.98 | 644.49 | 1,151.78 | 568.82 | 61.38 | -5.70 | 0.326 |
| 106.00 | -8.50 | -12.41 | 0.00 | -400.42 | 0.00 | 400.42 | 1,284.33 | 642.16 | 1,143.44 | 564.70 | 61.98 | -5.73 | 0.322 |
| 106.50 | -8.42 | -12.37 | 0.00 | -394.22 | 0.00 | 394.22 | 1,279.68 | 639.84 | 1,135.13 | 560.60 | 62.58 | -5.75 | 0.319 |
| 107.00 | -8.35 | -12.32 | 0.00 | -388.03 | 0.00 | 388.03 | 1,275.03 | 637.51 | 1,126.85 | 556.51 | 63.18 | -5.78 | 0.315 |
| 107.50 | -8.27 | -12.28 | 0.00 | -381.87 | 0.00 | 381.87 | 1,270.38 | 635.19 | 1,118.60 | 552.44 | 63.79 | -5.80 | 0.312 |
| 108.00 | -8.19 | -12.23 | 0.00 | -375.73 | 0.00 | 375.73 | 1,265.73 | 632.87 | 1,110.38 | 548.38 | 64.40 | -5.82 | 0.309 |

Site Number: 302494

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:53:56 PM
Customer: SPRINT NEXTEL


| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAP712589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $0.9 \mathrm{D}+1.6 \mathrm{~W}$ |  |  |  | 101 mph with No Ice (Reduced DL) |  |  |  |  |  | 41 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 <br> Dead Load Factor: 0.90 <br> Wind Load Factor : 1.60 |  |  |  |  |  |  |  |  |  | Wind Im | ortance | actor : | 1.00 |
| 136.00 | -3.18 | -5.99 | 0.00 | -84.45 | 0.00 | 84.45 | 747.01 | 373.51 | 522.82 | 258.20 | 104.74 | -8.08 | 0.332 |
| 136.50 | -3.15 | -5.96 | 0.00 | -81.45 | 0.00 | 81.45 | 744.70 | 372.35 | 518.77 | 256.20 | 105.59 | -8.11 | 0.322 |
| 137.00 | -3.12 | -5.92 | 0.00 | -78.47 | 0.00 | 78.47 | 742.37 | 371.18 | 514.72 | 254.20 | 106.43 | -8.14 | 0.313 |
| 137.50 | -3.09 | -5.88 | 0.00 | -75.52 | 0.00 | 75.52 | 740.03 | 370.01 | 510.69 | 252.21 | 107.29 | -8.17 | 0.304 |
| 138.00 | -3.07 | -5.84 | 0.00 | -72.57 | 0.00 | 72.57 | 737.68 | 368.84 | 506.66 | 250.22 | 108.14 | -8.20 | 0.294 |
| 138.50 | -3.04 | -5.81 | 0.00 | -69.65 | 0.00 | 69.65 | 735.32 | 367.66 | 502.65 | 248.24 | 109.00 | -8.22 | 0.285 |
| 139.00 | -3.01 | -5.77 | 0.00 | -66.75 | 0.00 | 66.75 | 732.95 | 366.47 | 498.64 | 246.26 | 109.86 | -8.25 | 0.275 |
| 139.50 | -2.98 | -5.73 | 0.00 | -63.86 | 0.00 | 63.86 | 730.57 | 365.28 | 494.64 | 244.28 | 110.72 | -8.28 | 0.266 |
| 140.00 | -2.95 | $-5.70$ | 0.00 | -61.00 | 0.00 | 61.00 | 728.18 | 364.09 | 490.64 | 242.31 | 111.59 | -8.30 | 0.256 |
| 140.50 | -2.93 | -5.66 | 0.00 | -58.15 | 0.00 | 58.15 | 725.44 | 362.72 | 486.44 | 240.23 | 112.45 | -8.33 | 0.246 |
| 141.00 | -2.91 | -5.13 | 0.00 | -55.32 | 0.00 | 55.32 | 721.95 | 360.98 | 481.74 | 237.92 | 113.32 | -8.35 | 0.237 |
| 141.50 | -2.89 | -5.10 | 0.00 | -52.75 | 0.00 | 52.75 | 718.47 | 359.23 | 477.08 | 235.61 | 114.20 | -8.38 | 0.228 |
| 142.00 | -2.86 | -5.06 | 0.00 | -50.20 | 0.00 | 50.20 | 714.98 | 357.49 | 472.43 | 233.32 | 115.07 | -8.40 | 0.219 |
| 142.50 | -2.84 | -5.02 | 0.00 | -47.67 | 0.00 | 47.67 | 711.49 | 355.75 | 467.81 | 231.03 | 115.95 | -8.42 | 0.211 |
| 143.00 | -2.81 | -4.99 | 0.00 | -45.16 | 0.00 | 45.16 | 708.01 | 354.00 | 463.21 | 228.76 | 116.83 | -8.44 | 0.202 |
| 143.50 | -2.79 | -4.95 | 0.00 | -42.67 | 0.00 | 42.67 | 704.52 | 352.26 | 458.63 | 226.50 | 117.71 | -8.46 | 0.193 |
| 144.00 | -2.76 | -4.92 | 0.00 | -40.19 | 0.00 | 40.19 | 701.03 | 350.52 | 454.07 | 224.25 | 118.60 | -8.48 | 0.183 |
| 144.50 | -2.74 | -4.88 | 0.00 | -37.73 | 0.00 | 37.73 | 697.55 | 348.77 | 449.54 | 222.01 | 119.48 | -8.50 | 0.174 |
| 145.00 | -2.71 | -4.85 | 0.00 | -35.29 | 0.00 | 35.29 | 694.06 | 347.03 | 445.03 | 219.78 | 120.37 | -8.52 | 0.165 |
| 145.50 | -2.69 | -4.81 | 0.00 | -32.87 | 0.00 | 32.87 | 690.57 | 345.29 | 440.55 | 217.57 | 121.26 | -8.53 | 0.155 |
| 146.00 | -2.67 | -4.78 | 0.00 | -30.46 | 0.00 | 30.46 | 687.09 | 343.54 | 436.08 | 215.36 | 122.15 | -8.55 | 0.146 |
| 146.50 | -2.64 | -4.74 | 0.00 | -28.07 | 0.00 | 28.07 | 683.60 | 341.80 | 431.64 | 213.17 | 123.05 | -8.56 | 0.136 |
| 147.00 | -2.62 | -4.70 | 0.00 | -25.70 | 0.00 | 25.70 | 680.11 | 340.06 | 427.22 | 210.99 | 123.94 | -8.58 | 0.126 |
| 147.50 | -2.60 | -4.67 | 0.00 | -23.35 | 0.00 | 23.35 | 676.63 | 338.31 | 422.83 | 208.82 | 124.84 | -8.59 | 0.116 |
| 148.00 | -2.57 | -4.63 | 0.00 | -21.02 | 0.00 | 21.02 | 673.14 | 336.57 | 418.45 | 206.66 | 125.73 | -8.60 | 0.106 |
| 148.50 | -2.55 | -4.60 | 0.00 | -18.70 | 0.00 | 18.70 | 669.65 | 334.83 | 414.10 | 204.51 | 126.63 | -8.61 | 0.095 |
| 149.00 | -2.53 | -4.56 | 0.00 | -16.40 | 0.00 | 16.40 | 666.16 | 333.08 | 409.78 | 202.37 | 127.53 | -8.62 | 0.085 |
| 149.50 | -2.51 | -4.53 | 0.00 | -14.12 | 0.00 | 14.12 | 662.68 | 331.34 | 405.47 | 200.25 | 128.43 | -8.63 | 0.074 |
| 150.00 | 0.00 | -4.10 | 0.00 | -11.85 | 0.00 | 11.85 | 659.19 | 329.60 | 401.19 | 198.13 | 129.33 | -8.64 | 0.060 |

Site Name: Hddm - Haddam, CT

| Load Case: | $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ | 50 mph with 0.75 in Radial Ice |
| :---: | :---: | ---: |
| Gust Response Factor: | 1.10 | Ice Dead Load Factor: 1.00 |
| Dead Load Factor: | 1.20 |  |
| Wind Load Factor: | 1.00 |  |

## Applied Segment Forces Summary

| Seg Elev <br> (ft) | Description | Shaft Forces |  | Discrete Forces |  |  |  | Linear Forces |  | Sum of Forces |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Wind FX <br> (b) | Dead <br> Load <br> (lb) | Wind FX <br> (b) | Torsion MY (lb-ft) | $\begin{gathered} \text { Moment } \\ \text { MZ } \\ \text { (lb-ft) } \end{gathered}$ | Dead Load <br> (lb) | Wind FX <br> (lb) | Dead <br> Load <br> (Ib) | Wind FX <br> (lb) | Dead <br> Load <br> (b) | Torsion <br> MY <br> (lb-ft) | Moment MZ <br> (Ib) |
| 0.00 |  | 4.7 | 0.0 |  |  |  |  |  |  |  |  |  |  |
| 0.50 |  | 9.5 | 113.9 |  |  |  |  | 0.0 | 0.0 55.6 | 4.7 9.5 | 0.0 169.5 | 0.0 | 0.0 |
| 1.00 |  | 9.5 | 116.4 |  |  |  |  | 0.0 0.0 | 55.6 55.9 | 9.5 9.5 | 169.5 | 0.0 | 0.0 |
| 1.50 |  | 9.5 | 117.5 |  |  |  |  | 0.0 | 56.0 | 9.5 | 173.5 | 0.0 0.0 | 0.0 0.0 |
| 2.00 |  | 9.5 | 118.2 |  |  |  |  | 0.0 | 56.1 | 9.5 | 174.3 | 0.0 | 0.0 |
| 2.50 |  | 9.5 | 118.7 |  |  |  |  | 0.0 | 56.2 | 9.5 | 174.9 | 0.0 | 0.0 |
| 3.00 |  | 9.5 | 119.0 |  |  |  |  | 0.0 | 56.3 | 9.5 | 175.3 | 0.0 | 0.0 |
| 3.50 4.00 |  | 9.5 | 119.3 |  |  |  |  | 0.0 | 56.3 | 9.5 | 175.6 | 0.0 | 0.0 |
| 4.00 4.50 |  | 9.5 | 119.4 |  |  |  |  | 0.0 | 56.4 | 9.5 | 175.8 | 0.0 | 0.0 |
| 4.50 5.00 |  | 9.5 | 119.6 |  |  |  |  | 0.0 | 56.4 | 9.5 | 176.0 | 0.0 | 0.0 |
| 5.50 |  | 9.5 | 119.7 |  |  |  |  | 0.0 | 56.5 | 9.5 | 176.1 | 0.0 | 0.0 |
| 6.00 |  | 9.4 9.4 | 119.7 119.8 |  |  |  |  | 0.0 | 56.5 | 9.4 | 176.2 | 0.0 | 0.0 |
| 6.50 |  | 9.4 | 119.8 |  |  |  |  | 0.0 | 56.6 | 9.4 | 176.3 | 0.0 | 0.0 |
| 7.00 |  | 9.4 | 119.7 |  |  |  |  | 0.0 | 56.6 | 9.4 | 176.3 | 0.0 | 0.0 |
| 7.50 |  | 9.4 | 119.7 |  |  |  |  | 0.0 | 56.6 | 9.4 | 176.4 | 0.0 | 0.0 |
| 8.00 |  | 9.4 | 119.7 |  |  |  |  | 0.0 0.0 | 56.6 | 9.4 | 176.4 | 0.0 | 0.0 |
| 8.50 |  | 9.3 | 119.6 |  |  |  |  | 0.0 0.0 | 56.7 108.4 | 9.4 9.3 | 176.3 | 0.0 | 0.0 |
| 9.00 |  | 9.3 | 119.6 |  |  |  |  | 0.0 | 108.5 | 9.3 | 228.0 | 0.0 | 0.0 |
| 9.50 |  | 9.3 | 119.5 |  |  |  |  | 0.0 | 108.5 | 9.3 9.3 | 228.1 | 0.0 | 0.0 |
| 10.00 |  | 9.3 | 119.4 |  |  |  |  | 0.0 0.0 | 108.7 | 9.3 | 228.2 | 0.0 | 0.0 |
| 10.50 |  | 9.3 | 119.3 |  |  |  |  | 0.0 0.0 | 108.8 109.0 | 9.3 | 228.2 | 0.0 | 0.0 |
| 11.00 |  | 9.3 | 119.2 |  |  |  |  | 0.0 | 109.1 | 9.3 9.3 | 228.3 | 0.0 | 0.0 |
| 11.50 |  | 9.3 | 119.1 |  |  |  |  | 0.0 | 109.3 | 9.3 | 228.3 | 0.0 | 0.0 |
| 12.00 |  | 9.2 | 119.0 |  |  |  |  | 0.0 | 109.4 | 9.3 | 228.4 | 0.0 | 0.0 |
| 12.50 |  | 9.2 | 118.8 |  |  |  |  |  | 109.4 | 9.2 | 228.4 | 0.0 | 0.0 |
| 13.00 |  | 9.2 | 118.7 |  |  |  |  | 0.0 0.0 | 109.5 | 9.2 | 228.4 | 0.0 | 0.0 |
| 13.50 |  | 9.2 | 118.6 |  |  |  |  | 0.0 0.0 | 109.7 | 9.2 | 228.4 | 0.0 | 0.0 |
| 14.00 |  | 9.2 | 118.4 |  |  |  |  | 0.0 | 109.8 | 9.2 | 228.4 | 0.0 | 0.0 |
| 14.50 |  | 9.2 | 118.3 |  |  |  |  | 0.0 0.0 | 109.9 110.0 | 9.2 9.2 | 228.3 | 0.0 | 0.0 |
| 15.00 |  | 9.1 | 118.2 |  |  |  |  | 0.0 | 110.1 | 9.2 9.1 | 228.3 | 0.0 0.0 | 0.0 |
| 15.50 |  | 9.1 | 118.0 |  |  |  |  | 0.0 | 110.2 | 9.1 | 228.2 | 0.0 | 0.0 |
| 16.00 |  | 9.1 | 117.8 |  |  |  |  | 0.0 | 110.3 | 9.1 | 228.2 | 0.0 | 0.0 |
| 16.50 |  | 9.1 | 117.7 |  |  |  |  | 0.0 | 110.4 | 9.1 | 228.1 | 0.0 0.0 | 0.0 0.0 |
| 17.00 |  | 9.1 | 117.5 |  |  |  |  | 0.0 | 110.5 | 9.1 | 228.0 | 0.0 | 0.0 |
| 17.50 18.00 |  | 9.1 | 117.4 |  |  |  |  | 0.0 | 110.6 | 9.1 | 228.0 | 0.0 | 0.0 |
| 18.50 |  | 9.0 9.0 | 117.2 |  |  |  |  | 0.0 | 110.7 | 9.0 | 227.9 | 0.0 | 0.0 |
| 19.00 |  | 9.0 9.0 | 117.0 |  |  |  |  | 0.0 | 110.8 | 9.0 | 227.8 | 0.0 | 0.0 |
| 19.50 |  | 9.0 | 116.7 |  |  |  |  | 0.0 | 110.9 | 9.0 | 227.7 | 0.0 | 0.0 |
| 20.00 |  | 9.0 | 116.5 |  |  |  |  | 0.0 | 110.9 | 9.0 | 227.6 | 0.0 | 0.0 |
| 20.50 |  | 8.9 | 116.3 |  |  |  |  | 0.0 | 111.0 | 9.0 | 227.5 | 0.0 | 0.0 |
| 21.00 |  | 8.9 | 116.1 |  |  |  |  | 0.0 | 111.1 | 8.9 | 227.4 | 0.0 | 0.0 |
| 21.50 |  | 8.9 | 116.0 |  |  |  |  | 0.0 | 111.2 | 8.9 | 227.3 | 0.0 | 0.0 |
| 22.00 |  | 8.9 | 115.8 |  |  |  |  | 0.0 0.0 | 111.3 111.3 | 8.9 | 227.2 | 0.0 | 0.0 |
| 22.50 |  | 8.9 | 115.6 |  |  |  |  | 0.0 | 111.3 | 8.9 | 227.1 | 0.0 | 0.0 |
| 23.00 |  | 8.9 | 115.4 |  |  |  |  | 0.0 | 111.4 | 8.9 | 227.0 | 0.0 | 0.0 |
| 23.50 |  | 8.8 | 115.2 |  |  |  |  | 0.0 | 111.6 | 8.9 | 226.9 | 0.0 0.0 | 0.0 0.0 |



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| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: 2018 by ATC IP LLC. All rights reserved. |  |
| Customer: | SPRINT NEXTEL |  | $4 / 24 / 2018$ 5:54:16 PM |



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| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: 0 OAA712589_C3 05 | $4 / 24 / 2018$ by ATC IP LLC. All rights reserved. |

Customer: $\quad$ SPRINT NEXTEL


Page: 36

| Site Number: | 302494 | Code: ANSI/TIA-222-G | ©2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:16 PM |
| Customer: | SPRINT NEXTEL |  |  |


| Load Case: $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ |  |  | 50 mph with 0.75 in Radial Ice |  |  |  |  |  | 40 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 <br> Dead Load Factor: 1.20 <br> Wind Load Factor : 1.00 |  |  | Ice Dead Load Factor : 1.00 |  |  |  |  |  | Wind Importance Factor: 1.00 <br> Ice Importance Factor: 1.00 |  |  |  |
| 108.00 |  | 8.7 | 60.5 |  |  |  | 0.0 | 102.0 | 8.7 | 162.5 | 0.0 | 0.0 |
| 108.50 |  | 8.7 | 60.3 |  |  |  | 0.0 | 102.0 | 8.7 | 162.3 | 0.0 | 0.0 |
| 109.00 |  | 8.7 | 60.1 |  |  |  | 0.0 | 102.0 | 8.7 | 162.1 | 0.0 | 0.0 |
| 109.50 |  | 8.6 | 59.9 |  |  |  | 0.0 | 102.0 | 8.6 | 161.9 | 0.0 | 0.0 |
| 110.00 | Top - Section 3 | 8.6 | 59.7 |  |  |  | 0.0 | 102.0 | 8.6 | 161.7 | 0.0 | 0.0 |
| 110.50 |  | 8.6 | 51.0 |  |  |  | 0.0 | 94.3 | 8.6 | 145.3 | 0.0 | 0.0 |
| 111.00 |  | 8.6 | 50.8 |  |  |  | 0.0 | 94.4 | 8.6 | $145.2$ | 0.0 | 0.0 |
| 111.50 |  | 8.6 | 50.6 |  |  |  | 0.0 | 94.4 | 8.6 | 145.0 | 0.0 | 0.0 |
| 112.00 |  | 8.6 | 50.5 |  |  |  | 0.0 | 94.4 | 8.6 | 144.8 | 0.0 | 0.0 |
| 112.50 |  | 8.5 | 50.3 |  |  |  | 0.0 | 94.4 | 8.5 | 144.7 | 0.0 | 0.0 |
| 113.00 |  | 8.5 | 50.1 |  |  |  | 0.0 | 94.4 | 8.5 | 144.5 | 0.0 | 0.0 |
| 113.50 |  | 8.5 | 49.9 |  |  |  | 0.0 | 94.4 | 8.5 | 144.4 | 0.0 | 0.0 |
| 114.00 |  | 8.5 | 49.8 |  |  |  | 0.0 | 94.5 | 8.5 | 144.2 | 0.0 | 0.0 |
| 114.50 |  | 8.5 | 49.6 |  |  |  | 0.0 | 94.5 | 8.5 | 144.1 | 0.0 | 0.0 |
| 115.00 |  | 8.5 | 49.4 |  |  |  | 0.0 | 94.5 | 8.5 | 143.9 | 0.0 | 0.0 |
| 115.50 |  | 8.4 | 49.3 |  |  |  | 0.0 | 94.5 | 8.4 | 143.8 | 0.0 | 0.0 |
| 116.00 |  | 8.4 | 49.1 |  |  |  | 0.0 | 94.5 | 8.4 | 143.6 | 0.0 | 0.0 |
| 116.50 | Reinf. Top | 8.4 | 48.9 |  |  |  | 0.0 | 94.5 | 8.4 | 143.5 | 0.0 | 0.0 |
| 117.00 |  | 8.4 | 48.7 |  |  |  | 0.0 | 63.9 | 8.4 | 112.7 | 0.0 | 0.0 |
| 117.50 |  | 8.4 | 48.6 |  |  |  | 0.0 | 64.0 | 8.4 | 112.5 | 0.0 | 0.0 |
| 118.00 |  | 8.4 | 48.4 |  |  |  | 0.0 | 64.0 | 8.4 | 112.4 | 0.0 | 0.0 |
| 118.50 |  | 8.3 | 48.2 |  |  |  | 0.0 | 59.5 | 8.3 | 107.8 | 0.0 | 0.0 |
| 119.00 |  | 8.3 | 48.1 |  |  |  | 0.0 | 59.6 | 8.3 | 107.6 | 0.0 | 0.0 |
| 119.50 |  | 8.3 | 47.9 |  |  |  | 0.0 | 59.6 | 8.3 | 107.5 | 0.0 | 0.0 |
| 120.00 |  | 8.3 | 47.7 |  |  |  | 0.0 | 59.6 | 8.3 | 107.3 | 0.0 | 0.0 |
| 120.50 |  | 8.3 | 47.5 |  |  |  | 0.0 | 59.6 | 8.3 | 107.1 | 0.0 | 0.0 |
| 121.00 |  | 8.3 | 47.4 |  |  |  | 0.0 | 59.6 | 8.3 | 107.0 | 0.0 | 0.0 |
| 121.50 |  | 8.2 | 47.2 |  |  |  | 0.0 | 59.6 | 8.2 | 106.8 | 0.0 | 0.0 |
| $122.00$ |  | 8.2 | $47.0$ |  |  |  | 0.0 | $59.6$ | 8.2 | $106.7$ | 0.0 | 0.0 |
| $122.50$ |  | 8.2 | $46.9$ |  |  |  | 0.0 | $59.7$ | 8.2 | $106.5$ | 0.0 | 0.0 |
| $123.00$ |  | 8.2 | $46.7$ |  |  |  | 0.0 | 59.7 | 8.2 | $106.4$ | 0.0 | 0.0 |
| 123.50 |  | 8.2 | 46.5 |  |  |  | 0.0 | 59.7 | 8.2 | 106.2 | 0.0 | 0.0 |
| 124.00 |  | 8.1 | 46.3 |  |  |  | 0.0 | 59.7 | 8.1 | 106.0 | 0.0 | 0.0 |
| 124.50 |  | 8.1 | 46.2 |  |  |  | 0.0 | 59.7 | 8.1 | 105.9 | 0.0 | 0.0 |
| 125.00 |  | 8.1 | 46.0 |  |  |  | 0.0 | 59.7 | 8.1 | 105.7 | 0.0 | 0.0 |
| 125.50 |  | 8.1 | 45.8 |  |  |  | 0.0 | 59.7 | 8.1 | 105.6 | 0.0 | 0.0 |
| 126.00 |  | 8.1 | 45.6 |  |  |  | 0.0 | 59.8 | 8.1 | 105.4 | 0.0 | 0.0 |
| 126.50 |  | 8.0 | 45.5 |  |  |  | 0.0 | 59.8 | 8.0 | 105.2 | 0.0 | 0.0 |
| 127.00 |  | 8.0 | 45.3 |  |  |  | 0.0 | 59.8 | 8.0 | 105.1 | 0.0 | 0.0 |
| 127.50 |  | 8.0 | 45.1 |  |  |  | 0.0 | 59.8 | 8.0 | 104.9 | 0.0 | 0.0 |
| 128.00 |  | 8.0 | 44.9 |  |  |  | 0.0 | 59.8 | 8.0 | 104.8 | 0.0 | 0.0 |
| $128.50$ |  | 8.0 | $44.8$ |  |  |  | 0.0 | $59.8$ | 8.0 | $104.6$ | 0.0 | 0.0 |
| $129.00$ |  | 8.0 | $44.6$ |  |  |  | 0.0 | $59.8$ | 8.0 | $104.4$ | 0.0 | 0.0 |
| $129.50$ |  | 7.9 | $44.4$ |  |  |  | 0.0 | $59.9$ | 7.9 | $104.3$ | 0.0 | 0.0 |
| 130.00 |  | 7.9 | 44.2 |  |  |  | 0.0 | 59.9 | 7.9 | 104.1 | 0.0 | 0.0 |
| 130.50 |  | 7.9 | 44.1 |  |  |  | 0.0 | 59.9 | 7.9 | 104.0 | 0.0 | 0.0 |
| 131.00 | Appurtenance(s) | 7.9 | 43.9819 .7 | 0.0 | 0.0 | 7,568.9 | 0.0 | 59.9 | 827.5 | 7,672.7 | 0.0 | 0.0 |
| 131.50 |  | 7.9 | 43.7 |  |  |  | 0.0 | 31.2 | 7.9 | 74.9 | 0.0 | 0.0 |
| 132.00 |  | 7.8 | 43.5 |  |  |  | 0.0 | 31.2 | 7.8 | 74.7 | 0.0 | 0.0 |
| 132.50 |  | 7.8 | 43.4 |  |  |  | 0.0 | 31.2 | 7.8 | 74.5 | 0.0 | 0.0 |
| 133.00 |  | 7.8 | 43.2 |  |  |  | 0.0 | 31.2 | 7.8 | 74.4 | 0.0 | 0.0 |
| 133.50 |  | 7.8 | 43.0 |  |  |  | 0.0 | 31.2 | 7.8 | 74.2 | 0.0 | 0.0 |
| 134.00 |  | 7.8 | 42.8 |  |  |  | 0.0 | 31.2 | 7.8 | 74.0 | 0.0 | 0.0 |
| 134.50 |  | 7.7 | 42.7 |  |  |  | 0.0 | 31.2 | 7.7 | 73.9 | 0.0 | 0.0 |
| 135.00 |  | 7.7 | 42.5 |  |  |  | 0.0 | 31.2 | 7.7 | 73.7 | 0.0 | 0.0 |
| 135.50 |  | 7.7 | 42.3 |  |  |  | 0.0 | 31.2 | 7.7 | 73.5 | 0.0 | 0.0 |
| 136.00 |  | 7.7 | 42.1 |  |  |  | 0.0 | 31.2 | 7.7 | 73.3 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | ---: | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:16 PM |  |
| Customer: | SPRINT NEXTEL |  |  |  |


| Load Case: $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ |  |  | 50 mph with 0.75 in Radial Ice |  |  |  |  |  |  | 40 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 |  |  | Ice Dead Load Factor : 1.00 |  |  |  |  |  |  | Wind Importance Factor : 1.00 |  |  |  |
| Dead Load Factor: 1.20 |  |  |  |  |  |  |  |  |  | Ice Importance Factor: 1.00 |  |  |  |
| Wind Load Factor : 1.00 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 136.50 |  | 7.6 | 42.0 |  |  |  |  | 0.0 | 31.2 | 7.6 | 73.2 | 0.0 | 0.0 |
| 137.00 |  | 7.6 | 41.8 |  |  |  |  | 0.0 | 31.2 | 7.6 | 73.0 | 0.0 | 0.0 |
| 137.50 |  | 7.6 | 41.6 |  |  |  |  | 0.0 | 31.2 | 7.6 | 72.8 | 0.0 | 0.0 |
| 138.00 |  | 7.6 | 41.4 |  |  |  |  | 0.0 | 31.2 | 7.6 | 72.7 | 0.0 | 0.0 |
| 138.50 |  | 7.6 | 41.3 |  |  |  |  | 0.0 | 31.2 | 7.6 | 72.5 | 0.0 | 0.0 |
| 139.00 |  | 7.5 | 41.1 |  |  |  |  | 0.0 | 31.2 | 7.5 | 72.3 | 0.0 | 0.0 |
| 139.50 |  | 7.5 | 40.9 |  |  |  |  | 0.0 | 31.2 | 7.5 | 72.1 | 0.0 | 0.0 |
| 140.00 |  | 7.5 | 40.7 |  |  |  |  | 0.0 | 31.2 | 7.5 | 72.0 | 0.0 | 0.0 |
| 140.50 |  | 7.5 | 40.6 |  |  |  |  | 0.0 | 31.2 | 7.5 | 71.8 | 0.0 | 0.0 |
| 141.00 Appurtenance(s)141.50 |  | 7.5 | 40.4 | 92.9 | 0.0 | 0.0 | 422.6 | 0.0 | 31.3 | 100.4 | 494.3 | 0.0 | 0.0 |
|  |  | 7.4 | 40.2 |  |  |  |  | 0.0 | 17.5 | 7.4 | 57.7 | 0.0 | 0.0 |
| 142.00 |  | 7.4 | 40.0 |  |  |  |  | 0.0 | 17.5 | 7.4 | 57.5 | 0.0 | 0.0 |
| 142.50 |  | 7.4 | 39.8 |  |  |  |  | 0.0 | 17.5 | 7.4 | 57.3 | 0.0 | 0.0 |
| 143.00 |  | 7.4 | 39.7 |  |  |  |  | 0.0 | 17.5 | 7.4 | 57.1 | 0.0 | 0.0 |
| 143.50 |  | 7.3 | 39.5 |  |  |  |  | 0.0 | 17.5 | 7.3 | 57.0 | 0.0 | 0.0 |
| 144.00 |  | 7.3 | 39.3 |  |  |  |  | 0.0 | 17.5 | 7.3 | 56.8 | 0.0 | 0.0 |
| 144.50 |  | 7.3 | 39.1 |  |  |  |  | 0.0 | 17.5 | 7.3 | 56.6 | 0.0 | 0.0 |
| 145.00 |  | 7.3 | 39.0 |  |  |  |  | 0.0 | 17.5 | 7.3 | 56.4 | 0.0 | 0.0 |
| 145.50 |  | 7.3 | 38.8 |  |  |  |  | 0.0 | 17.5 | 7.3 | 56.3 | 0.0 | 0.0 |
| 146.00 |  | 7.2 | 38.6 |  |  |  |  | 0.0 | 17.5 | 7.2 | 56.1 | 0.0 | 0.0 |
| 146.50 |  | 7.2 | 38.4 |  |  |  |  | 0.0 | 17.5 | 7.2 | 55.9 | 0.0 | 0.0 |
| 147.00 |  | 7.2 | 38.2 |  |  |  |  | 0.0 | 17.5 | 7.2 | 55.7 | 0.0 | 0.0 |
| 147.50 |  | 7.2 | 38.1 |  |  |  |  | 0.0 | 17.5 | 7.2 | 55.5 | 0.0 | 0.0 |
| 148.00 |  | 7.1 | 37.9 |  |  |  |  | 0.0 | 17.5 | 7.1 | 55.4 | 0.0 | 0.0 |
| 148.50 |  | 7.1 | 37.7 |  |  |  |  | 0.0 | 17.5 | 7.1 | 55.2 | 0.0 | 0.0 |
| 149.00 |  | 7.1 | 37.5 |  |  |  |  | 0.0 | 17.5 | 7.1 | 55.0 | 0.0 | 0.0 |
| 149.50 |  | 7.1 | 37.4 |  |  |  |  | 0.0 | 17.5 | 7.1 | 54.8 | 0.0 | 0.0 |
| 150.00 | Appurtenance(s) | 3.5 | 37.2 | 939.2 | 0.0 | 2,498.5 | ,191.6 | 0.0 | 17.5 | 942.8 | 8,246.2 | 0.0 | 0.0 |
|  |  |  |  |  |  |  |  |  |  | 4,498.10 | 67,127.4 | 0.00 | 0.00 |


| Load Case: $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ | 50 mph with 0.75 in Radial Ice | 40 Iterations |
| :---: | :---: | :---: |
| Gust Response Factor: 1.10 | Ice Dead Load Factor: 1.00 | Wind Importance Factor: 1.00 |
| Dead Load Factor: 1.20 | Ice Importance Factor: 1.00 |  |
| Wind Load Factor: 1.00 |  |  |

Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{gathered} \mathrm{Pu} \\ \text { FY (-) } \\ \text { (kips) } \\ \hline \end{gathered}$ | $\begin{aligned} & \mathrm{Vu} \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ | $\begin{gathered} \text { Tu } \\ \text { MY } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MZ} \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | phi phi <br> Pn Vn <br> (kips) (kips) | phi phi <br> Tn Mn <br> (ft-kips) (ft-kips) | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -67.13 | -4.49 | 0.00 | -525.86 | 0.00 | 525.86 | 3,157.17 1,578.58 | 4,812.28 2,376.61 | 0.00 | 0.00 | 0.149 |
| 0.50 | -66.96 | -4.49 | 0.00 | -523.61 | 0.00 | 523.61 | 3,152.93 1,576.47 | 4,795.55 2,368.34 | 0.00 | -0.01 | 0.149 |
| 1.00 | -66.78 | -4.49 | 0.00 | -521.36 | 0.00 | 521.36 | 3,148.69 1,574.34 | 4,778.83 2,360.09 | 0.00 | -0.01 | 0.148 |
| 1.50 | -66.61 | -4.49 | 0.00 | -519.12 | 0.00 | 519.12 | 3,144.43 1,572.22 | 4,762.13 2,351.84 | 0.00 | -0.02 | 0.148 |
| 2.00 | -66.44 | -4.48 | 0.00 | -516.87 | 0.00 | 516.87 | 3,140.17 1,570.08 | 4,745.43 2,343.59 | 0.01 | -0.02 | 0.148 |
| 2.50 | -66.26 | -4.48 | 0.00 | -514.63 | 0.00 | 514.63 | 3,135.89 1,567.94 | 4,728.75 2,335.35 | 0.01 | -0.03 | 0.148 |
| 3.00 | -66.08 | -4.48 | 0.00 | -512.39 | 0.00 | 512.39 | 3,131.60 1,565.80 | 4,712.08 $2,327.12$ | 0.01 | -0.04 | 0.147 |
| 3.50 | -65.91 | -4.48 | 0.00 | -510.15 | 0.00 | 510.15 | 3,127.31 1,563.65 | 4,695.42 2,318.89 | 0.02 | -0.04 | 0.147 |
| 4.00 | -65.73 | -4.47 | 0.00 | -507.91 | 0.00 | 507.91 | 3,123.00 1,561.50 | 4,678.77 2,310.67 | 0.02 | -0.05 | 0.147 |
| 4.50 | -65.56 | -4.47 | 0.00 | -505.68 | 0.00 | 505.68 | 3,118.68 1,559.34 | 4,662.14 2,302.45 | 0.03 | -0.05 | 0.146 |
| 5.00 | -65.38 | -4.47 | 0.00 | -503.44 | 0.00 | 503.44 | 3,114.35 1,557.18 | 4,645.51 2,294.24 | 0.03 | -0.06 | 0.146 |
| 5.50 | -65.20 | -4.46 | 0.00 | -501.21 | 0.00 | 501.21 | 3,110.02 1,555.01 | 4,628.91 2,286.04 | 0.04 | -0.06 | 0.146 |
| 6.00 | -65.03 | -4.46 | 0.00 | -498.98 | 0.00 | 498.98 | 3,105.67 1,552.83 | 4,612.31 2,277.85 | 0.04 | -0.07 | 0.146 |
| 6.50 | -64.85 | -4.46 | 0.00 | -496.75 | 0.00 | 496.75 | 3,101.31 1,550.65 | 4,595.73 2,269.66 | 0.05 | -0.08 | 0.145 |
| 7.00 | -64.67 | -4.46 | 0.00 | -494.52 | 0.00 | 494.52 | 3,096.94 1,548.47 | 4,579.16 2,261.47 | 0.06 | -0.08 | 0.145 |
| 7.50 | -64.50 | -4.45 | 0.00 | -492.29 | 0.00 | 492.29 | 3,092.56 1,546.28 | 4,562.60 2,253.30 | 0.07 | -0.09 | 0.145 |
| 8.00 | -64.32 | -4.45 | 0.00 | -490.06 | 0.00 | 490.06 | 3,088.17 1,544.08 | 4,546.06 2,245.13 | 0.08 | -0.09 | 0.145 |
| 8.50 | -64.09 | -4.45 | 0.00 | -487.84 | 0.00 | 487.84 | 3,083.77 1,541.88 | 4,529.53 2,236.96 | 0.09 | -0.10 | 0.144 |
| 9.00 | -63.86 | -4.44 | 0.00 | -485.62 | 0.00 | 485.62 | 3,079.36 1,539.68 | 4,513.01 2,228.81 | 0.10 | -0.11 | 0.144 |
| 9.50 | -63.63 | -4.44 | 0.00 | -483.40 | 0.00 | 483.40 | 3,074.94 1,537.47 | 4,496.51 2,220.66 | 0.11 | -0.11 | 0.144 |
| 10.00 | -63.40 | -4.44 | 0.00 | -481.18 | 0.00 | 481.18 | 3,070.50 1,535.25 | 4,480.02 2,212.51 | 0.12 | -0.12 | 0.143 |
| 10.50 | -63.18 | -4.43 | 0.00 | -478.96 | 0.00 | 478.96 | 3,066.06 1,533.03 | 4,463.54 2,204.38 | 0.14 | -0.12 | 0.143 |
| 11.00 | -62.95 | -4.43 | 0.00 | -476.74 | 0.00 | 476.74 | 3,061.61 1,530.80 | 4,447.08 2,196.25 | 0.15 | -0.13 | 0.143 |
| 11.50 | -62.72 | -4.43 | 0.00 | -474.52 | 0.00 | 474.52 | 3,057.15 1,528.57 | 4,430.63 2,188.12 | 0.16 | -0.14 | 0.143 |
| 12.00 | -62.49 | -4.42 | 0.00 | -472.31 | 0.00 | 472.31 | 3,052.67 1,526.34 | 4,414.20 2,180.01 | 0.18 | -0.14 | 0.142 |
| 12.50 | -62.26 | -4.42 | 0.00 | -470.10 | 0.00 | 470.10 | 3,048.19 1,524.09 | 4,397.78 2,171.90 | 0.19 | -0.15 | 0.142 |
| 13.00 | -62.03 | -4.42 | 0.00 | -467.89 | 0.00 | 467.89 | 3,043.69 1,521.85 | 4,381.37 2,163.80 | 0.21 | -0.15 | 0.142 |
| 13.50 | -61.80 | -4.41 | 0.00 | -465.68 | 0.00 | 465.68 | 3,039.19 1,519.59 | 4,364.98 2,155.70 | 0.23 | -0.16 | 0.141 |
| 14.00 | -61.57 | -4.41 | 0.00 | -463.47 | 0.00 | 463.47 | 3,034.67 1,517.34 | 4,348.61 2,147.61 | 0.24 | -0.17 | 0.141 |
| 14.50 1500 | -61.35 | -4.41 | 0.00 | -461.27 | 0.00 | 461.27 | $3,030.151,515.07$ | $4,332.24$ 2,139.53 | 0.26 | -0.17 | 0.141 |
| 15.00 15.50 | -61.12 | -4.40 | 0.00 0.00 | -459.06 | 0.00 0.00 | 459.06 456.86 | $3,025.611,512.81$ $3,021.071510 .53$ | $4,315.90$ <br> $4,299.57131 .46$ | 0.28 | -0.18 | 0.140 0.140 |
| 16.00 | -60.66 | -4.40 | 0.00 | -454.66 | 0.00 | 456.86 454.66 | $3,021.07$ $3,016.51$ $1,508.25$ | $4,299.57$ 2,123.39 $4,283.25$ $2,115.33$ | 0.30 0.32 | -0.18 -0.19 | 0.140 0.140 |
| 16.50 | -60.43 | -4.39 | 0.00 | -452.46 | 0.00 | 452.46 | 3,011.94 1,505.97 | 4,266.95 2,107.28 | 0.34 | -0.20 | 0.140 |
| 17.00 | -60.20 | -4.39 | 0.00 | -450.27 | 0.00 | 450.27 | 3,007.37 1,503.68 | 4,250.66 2,099.24 | 0.36 | -0.20 | 0.139 |
| 17.50 | -59.97 | -4.39 | 0.00 | -448.07 | 0.00 | 448.07 | 3,002.78 1,501.39 | 4,234.39 2,091.20 | 0.38 | -0.21 | 0.139 |
| 18.00 | -59.75 | -4.38 | 0.00 | -445.88 | 0.00 | 445.88 | 2,998.18 1,499.09 | 4,218.13 2,083.18 | 0.40 | -0.21 | 0.139 |
| 18.50 | -59.52 | -4.38 | 0.00 | -443.69 | 0.00 | 443.69 | 2,993.57 1,496.79 | 4,201.89 2,075.15 | 0.43 | -0.22 | 0.138 |
| 19.00 | -59.29 | -4.38 | 0.00 | -441.50 | 0.00 | 441.50 | 2,988.95 1,494.48 | 4,185.66 2,067.14 | 0.45 | -0.23 | 0.138 |
| 19.50 | -59.06 | -4.37 | 0.00 | -439.31 | 0.00 | 439.31 | 2,984.32 1,492.16 | 4,169.45 2,059.13 | 0.47 | -0.23 | 0.138 |
| 20.00 | -58.83 | -4.37 | 0.00 | -437.12 | 0.00 | 437.12 | 2,979.68 1,489.84 | 4,153.25 2,051.14 | 0.50 | -0.24 | 0.137 |
| 20.50 | -58.61 | -4.37 | 0.00 | -434.94 | 0.00 | 434.94 | 2,975.03 1,487.52 | 4,137.08 2,043.15 | 0.52 | -0.25 | 0.137 |
| 21.00 | -58.38 | -4.36 | 0.00 | -432.76 | 0.00 | 432.76 | 2,970.37 1,485.19 | 4,120.91 2,035.16 | 0.55 | -0.25 | 0.137 |
| 21.50 | -58.15 | -4.36 | 0.00 | -430.57 | 0.00 | 430.57 | 2,965.70 1,482.85 | 4,104.77 2,027.19 | 0.58 | -0.26 | 0.136 |
| 22.00 | -57.92 | -4.35 | 0.00 | -428.40 | 0.00 | 428.40 | 2,961.02 1,480.51 | 4,088.63 2,019.22 | 0.60 | -0.26 | 0.136 |
| 22.50 | -57.69 | -4.35 | 0.00 | -426.22 | 0.00 | 426.22 | 2,956.33 1,478.16 | 4,072.52 2,011.26 | 0.63 | -0.27 | 0.136 |
| 23.00 | -57.47 | -4.35 | 0.00 | -424.04 | 0.00 | 424.04 | 2,951.62 1,475.81 | 4,056.42 2,003.31 | 0.66 | -0.28 | 0.136 |
| 23.50 | -57.24 | -4.34 | 0.00 | -421.87 | 0.00 | 421.87 | 2,946.91 1,473.46 | 4,040.34 1,995.37 | 0.69 | -0.28 | 0.135 |
| 24.00 | -57.01 | -4.34 | 0.00 | -419.70 | 0.00 | 419.70 | 2,942.19 1,471.09 | 4,024.27 1,987.44 | 0.72 | -0.29 | 0.135 |
| 24.50 | -56.79 | -4.33 | 0.00 | -417.53 | 0.00 | 417.53 | 2,937.46 1,468.73 | 4,008.22 1,979.51 | 0.75 | -0.29 | 0.135 |
| 25.00 | -56.56 | -4.33 | 0.00 | -415.36 | 0.00 | 415.36 | 2,932.71 1,466.36 | 3,992.19 1,971.59 | 0.78 | -0.30 | 0.134 |

Customer: SPRINT NEXTEL

Site Number: 302494

| Site Name: | Hddm - Haddam, CT |
| :--- | :--- |
| Customer: | SPRINT NEXTEL |

SPRINTNEXTEL


Page: 41

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:16 PM
Customer: SPRINT NEXTEL

| Load Case: $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ |  |  |  | 50 mph with 0.75 in Radial Ice |  |  |  |  |  | 40 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 <br> Dead Load Factor: 1.20 <br> Wind Load Factor: 1.00 |  |  |  | ice Dead Load Factor : 1.00 |  |  |  |  |  | Wind Importance Factor: 1.00 Ice Importance Factor : 1.00 |  |  |  |
|  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 80.00 | -33.59 | -3.64 | 0.00 |  |  |  |  | -193.58 | 0.00 | 193.58 | 1,440.00 | 720.00 | 1,526.12 | 753.69 | 8.49 |  | 0.140 |
| 80.50 | -33.41 | -3.64 | $0.00$ | $-191.76$ | 0.00 | $191.76$ | 1,437.32 | 718.66 | 1,518.59 | 749.97 | 8.61 | -1.07 | 0.139 |
| 81.00 | -33.24 | -3.63 | 0.00 | -189.94 | 0.00 | 189.94 | 1,434.62 | 717.31 | 1,511.06 | 746.26 | 8.72 | -1.08 | 0.139 |
| 81.50 | -33.07 | -3.62 | 0.00 | -188.13 | 0.00 | 188.13 | 1,431.91 | 715.96 | 1,503.54 | 742.54 | 8.83 | -1.09 | 0.138 |
| 82.00 | -32.90 | -3.61 | 0.00 | -186.32 | 0.00 | 186.32 | 1,429.20 | 714.60 | 1,496.03 | 738.83 | 8.95 | -1.09 | 0.137 |
| 82.50 | -32.72 | -3.60 | 0.00 | -184.51 | 0.00 | 184.51 | 1,426.47 | 713.23 | 1,488.53 | 735.13 | 9.06 | -1.10 | 0.136 |
| 83.00 | -32.55 | -3.60 | 0.00 | -182.71 | 0.00 | 182.71 | 1,423.73 | 711.87 | 1,481.03 | 731.43 | 9.18 | -1.11 | 0.135 |
| 83.50 | -32.38 | -3.59 | 0.00 | -180.91 | 0.00 | 180.91 | 1,420.98 | 710.49 | 1,473.54 | 727.73 | 9.29 | -1.12 | 0.134 |
| 84.00 | -32.21 | -3.58 | 0.00 | -179.12 | 0.00 | 179.12 | 1,418.23 | 709.11 | 1,466.06 | 724.03 | 9.41 | -1.12 | 0.133 |
| 84.50 8500 | -32.04 -31.87 | -3.57 -3.56 | 0.00 | -177.33 | 0.00 | 177.33 | 1,415.46 | 707.73 | 1,458.58 | 720.34 | 9.53 | -1.13 | 0.133 |
| 85.00 | -31.87 | -3.56 | 0.00 | -175.55 | 0.00 | 175.55 | 1,412.68 | 706.34 | 1,451.11 | 716.65 | 9.65 | -1.14 | 0.132 |
| 85.50 | -31.70 | -3.55 | 0.00 | -173.77 | 0.00 | 173.77 | 1,409.89 | 704.94 | 1,443.65 | 712.97 | 9.77 | -1.15 | 0.131 |
| 86.00 | -31.53 | -3.55 | 0.00 | -171.99 | 0.00 | 171.99 | 1,407.09 | 703.54 | 1,436.20 | 709.28 | 9.89 | -1.15 | 0.130 |
| 86.50 | -31.36 | -3.54 | 0.00 | -170.22 | 0.00 | 170.22 | 1,404.28 | 702.14 | 1,428.75 | 705.61 | 10.01 | -1.16 | 0.129 |
| 87.00 | -31.19 | -3.53 | 0.00 | -168.45 | 0.00 | 168.45 | 1,401.46 | 700.73 | 1,421.32 | 701.93 | 10.13 | -1.17 | 0.128 |
| 87.50 | -31.02 | -3.52 | 0.00 | -166.68 | 0.00 | 166.68 | 1,398.63 | 699.31 | 1,413.89 | 698.26 | 10.25 | -1.18 | 0.127 |
| 88.00 | -30.85 | -3.51 | 0.00 | -164.92 | 0.00 | 164.92 | 1,395.79 | 697.89 | 1,406.46 | 694.60 | 10.38 | -1.18 | 0.126 |
| 88.50 | -30.68 | -3.50 | 0.00 | -163.17 | 0.00 | 163.17 | 1,392.93 | 696.47 | 1,399.05 | 690.94 | 10.50 | -1.19 | 0.125 |
| 89.00 | -30.51 | -3.49 | 0.00 | -161.42 | 0.00 | 161.42 | 1,390.07 | 695.04 | 1,391.64 | 687.28 | 10.63 | -1.20 | 0.125 |
| 89.50 | -30.34 | -3.48 | 0.00 | -159.67 | 0.00 | 159.67 | 1,387.20 | 693.60 | 1,384.25 | 683.63 | 10.75 | -1.21 | 0.124 |
| 90.00 | -30.17 | -3.48 | 0.00 | -157.93 | 0.00 | 157.93 | 1,384.32 | 692.16 | 1,376.86 | 679.98 | 10.88 | -1.21 | 0.123 |
| 90.50 | -30.00 | -3.47 | 0.00 | -156.19 | 0.00 | 156.19 | 1,381.42 | 690.71 | 1,369.48 | 676.33 | 11.01 | -1.22 | 0.122 |
| 91.00 | -29.83 | -3.46 | 0.00 | -154.46 | 0.00 | 154.46 | 1,378.52 | 689.26 | 1,362.10 | 672.69 | 11.14 | -1.23 | 0.121 |
| 91.50 | -29.66 | -3.45 | 0.00 | -152.73 | 0.00 | 152.73 | 1,375.61 | 687.80 | 1,354.74 | 669.06 | 11.27 | -1.24 | 0.120 |
| 92.00 | -29.49 | -3.44 | 0.00 | -151.01 | 0.00 | 151.01 | 1,372.68 | 686.34 | 1,347.39 | 665.42 | 11.40 | -1.24 | 0.119 |
| 92.50 | -29.33 | -3.43 | 0.00 | -149.29 | 0.00 | 149.29 | 1,369.75 | 684.87 | 1,340.04 | 661.80 | 11.53 | -1.25 | 0.118 |
| 93.00 | -29.16 | -3.42 | 0.00 | -147.57 | 0.00 | 147.57 | 1,366.80 | 683.40 | 1,332.70 | 658.17 | 11.66 | -1.26 | 0.117 |
| 93.50 | -28.99 | -3.41 | 0.00 | -145.86 | 0.00 | 145.86 | 1,363.85 | 681.92 | 1,325.38 | 654.55 | 11.79 | -1.27 | 0.116 |
| 94.00 | -28.82 | -3.40 | 0.00 | -144.15 | 0.00 | 144.15 | 1,360.88 | 680.44 | 1,318.06 | 650.94 | 11.92 | -1.27 | 0.115 |
| $\begin{aligned} & 94.50 \\ & 95.00 \end{aligned}$ | $\begin{aligned} & -28.65 \\ & -28.49 \end{aligned}$ | -3.39 -3.39 | 0.00 0.00 | -142.45 -140.75 | 0.00 | 142.45 140 | 1,357.90 | 678.95 | 1,310.75 | 647.33 | 12.06 | -1.28 | 0.115 |
| 95.50 | -28.32 | -3.38 | 0.00 0.00 | -140.75 -139.06 | 0.00 0.00 | 140.75 139.06 | $1,354.92$ $1,351.92$ | 677.46 | 1,303.45 | 643.72 | 12.19 | -1.29 | 0.114 |
| 96.00 | -28.15 | -3.37 | 0.00 | -137.37 | 0.00 | 137.37 | 1,348.91 | 674.46 | 1,288.88 | 636.53 | 12.46 | -1.30 | 0.112 |
| 96.50 | -27.99 | -3.36 | 0.00 | -135.69 | 0.00 | 135.69 | 1,345.89 | 672.95 | 1,281.61 | 632.94 | 12.60 | -1.31 | 0.111 |
| 97.00 | -27.82 | -3.35 | 0.00 | -134.01 | 0.00 | 134.01 | 1,342.86 | 671.43 | 1,274.35 | 629.35 | 12.74 | -1.32 | 0.110 |
| 97.50 | -27.65 | -3.34 | 0.00 | -132.34 | 0.00 | 132.34 | 1,339.82 | 669.91 | 1,267.09 | 625.77 | 12.87 | -1.32 | 0.109 |
| 98.00 | -27.49 | -3.33 | 0.00 | -130.67 | 0.00 | 130.67 | 1,336.78 | 668.39 | 1,259.85 | 622.19 | 13.01 | -1.33 | 0.108 |
| 98.50 | -27.32 | -3.32 | 0.00 | -129.00 | 0.00 | 129.00 | 1,333.72 | 666.86 | 1,252.62 | 618.62 | 13.15 | -1.34 | 0.107 |
| 99.00 | -27.15 | -3.31 | 0.00 | -127.34 | 0.00 | 127.34 | 1,330.65 | 665.32 | 1,245.40 | 615.06 | 13.29 | -1.34 | 0.106 |
| 99.50 | -26.99 | -3.30 | 0.00 | -125.69 | 0.00 | 125.69 | 1,327.57 | 663.78 | 1,238.19 | 611.50 | 13.44 | -1.35 | 0.105 |
| 100.00 | -26.82 | -3.29 | 0.00 | -124.04 | 0.00 | 124.04 | 1,324.47 | 662.24 | 1,230.99 | 607.94 | 13.58 | -1.36 | 0.104 |
| 100.50 | -26.66 | -3.28 | 0.00 | -122.39 | 0.00 | 122.39 | 1,321.37 | 660.69 | 1,223.80 | 604.39 | 13.72 | -1.36 | 0.103 |
| 101.00 | -26.49 | -3.27 | 0.00 | -120.75 | 0.00 | 120.75 | 1,318.26 | 659.13 | 1,216.62 | 600.84 | 13.86 | -1.37 | 0.102 |
| 101.50 | -26.33 | -3.26 | 0.00 | -119.12 | 0.00 | 119.12 | 1,315.14 | 657.57 | 1,209.45 | 597.30 | 14.01 | -1.38 | 0.101 |
| 102.00 | -26.16 | -3.25 | 0.00 | -117.49 | 0.00 | 117.49 | 1,312.01 | 656.00 | 1,202.30 | 593.77 | 14.15 | -1.38 | 0.100 |
| 102.50 | -26.00 | -3.24 | 0.00 | -115.86 | 0.00 | 115.86 | 1,308.86 | 654.43 | 1,195.15 | 590.24 | 14.30 | -1.39 | 0.099 |
| 103.00 | -25.83 | -3.23 | 0.00 | -114.24 | 0.00 | 114.24 | 1,305.71 | 652.86 | 1,188.02 | 586.72 | 14.44 | -1.40 | 0.098 |
| 103.50 | -25.67 | -3.22 | 0.00 | -112.62 | 0.00 | 112.62 | 1,302.55 | 651.27 | 1,180.89 | 583.20 | 14.59 | -1.40 | 0.097 |
| 104.00 | -25.51 | -3.21 | 0.00 | -111.01 | 0.00 | 111.01 | 1,299.37 | 649.69 | 1,173.78 | 579.69 | 14.74 | -1.41 | 0.096 |
| 104.50 | -25.34 | -3.20 | 0.00 | -109.41 | 0.00 | 109.41 | 1,296.19 | 648.09 | 1,166.68 | 576.18 | 14.89 | -1.42 | 0.095 |
| 105.00 | -25.18 | -3.19 | 0.00 | -107.80 | 0.00 | 107.80 | 1,292.99 | 646.50 | 1,159.59 | 572.68 | 15.03 | -1.42 | 0.094 |
| 105.50 | -25.02 | -3.18 | 0.00 | -106.21 | 0.00 | 106.21 | 1,288.98 | 644.49 | 1,151.78 | 568.82 | 15.18 | -1.43 | 0.094 |
| 106.00 | -24.85 | -3.17 | 0.00 | -104.62 | 0.00 | 104.62 | 1,284.33 | 642.16 | 1,143.44 | 564.70 | 15.33 | -1.44 | 0.093 |
| 106.50 | -24.69 | -3.16 | 0.00 | -103.03 | 0.00 | 103.03 | 1,279.68 | 639.84 | 1,135.13 | 560.60 | 15.49 | -1.44 | 0.092 |
| 107.00 | -24.53 | -3.15 | 0.00 | -101.45 | 0.00 | 101.45 | 1,275.03 | 637.51 | 1,126.85 | 556.51 | 15.64 | -1.45 | 0.091 |
| 107.50 | -24.36 | -3.14 | 0.00 | -99.87 | 0.00 | 99.87 | 1,270.38 | 635.19 | 1,118.60 | 552.44 | 15.79 | -1.46 | 0.090 |
| 108.00 | -24.20 | -3.13 | 0.00 | -98.30 | 0.00 | 98.30 | 1,265.73 | 632.87 | 1,110.38 | 548.38 | 15.94 | -1.46 | 0.089 |

Site Number: 302494
Site Name: Hddm-Haddam, CT
Customer: SPRINT NEXTEL

| Load Case: $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ |  |  |  | 50 mph with 0.75 in Radial Ice |  |  |  |  |  | 40 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 |  |  |  | Ice Dead Load Factor : 1.00 |  |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
| Dead Load |  | tor: 1.20 |  |  |  |  |  |  |  | Ice Importance Factor: 1.00 |  |  |  |
| Wind Load Factor: 1.00 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 108.50 | -24.04 | -3.12 | 0.00 | -96.74 | 0.00 | 96.74 | 1,261.08 | 630.54 | 1,102.19 | 544.33 | 16.10 | -1.47 | 0.088 |
| 109.00 | -23.88 | -3.11 | 0.00 | -95.18 | 0.00 | 95.18 | 1,256.43 | 628.22 | 1,094.04 | 540.30 | 16.25 | -1.47 | 0.087 |
| 109.50 | -23.71 | -3.10 | 0.00 | -93.62 | 0.00 | 93.62 | 1,251.78 | 625.89 | 1,085.91 | 536.29 | 16.40 | -1.48 | 0.086 |
| 110.00 | -23.55 | -3.09 | 0.00 | -92.07 | 0.00 | 92.07 | 1,247.14 | 623.57 | 1,077.81 | 532.29 | 16.56 | -1.49 | 0.085 |
| 110.00 | -23.55 | -3.09 | 0.00 | -92.07 | 0.00 | 92.07 | 853.24 | 426.62 | 741.79 | 366.34 | 16.56 | -1.49 | 0.000 |
| 110.50 | -23.41 | -3.08 | 0.00 | -90.52 | 0.00 | 90.52 | 851.46 | 425.73 | 737.46 | 364.21 | 16.72 | -1.49 | 0.119 |
| 111.00 | -23.26 | -3.07 | 0.00 | -88.98 | 0.00 | 88.98 | 849.67 | 424.84 | 733.15 | 362.07 | 16.87 | -1.50 | 0.117 |
| 111.50 | -23.12 | -3.06 | 0.00 | -87.45 | 0.00 | 87.45 | 847.87 | 423.94 | 728.83 | 359.94 | 17.03 | -1.51 | 0.116 |
| 112.00 | -22.97 | -3.05 | 0.00 | -85.91 | 0.00 | 85.91 | 846.07 | 423.03 | 724.52 | 357.81 | 17.19 | -1.52 | 0.114 |
| 112.50 | -22.83 | -3.04 | 0.00 | -84.39 | 0.00 | 84.39 | 844.25 | 422.12 | 720.21 | 355.68 | 17.35 | -1.52 | 0.113 |
| 113.00 | -22.68 | -3.03 | 0.00 | -82.87 | 0.00 | 82.87 | 842.42 | 421.21 | 715.90 | 353.56 | 17.51 | -1.53 | 0.111 |
| 113.50 | -22.54 | -3.03 | 0.00 | -81.35 | 0.00 | 81.35 | 840.58 | 420.29 | 711.60 | 351.43 | 17.67 | -1.54 | 0.110 |
| 114.00 | -22.39 | -3.02 | 0.00 | -79.84 | 0.00 | 79.84 | 838.73 | 419.36 | 707.30 | 349.31 | 17.83 | -1.55 | 0.108 |
| 114.50 | -22.25 | -3.01 | 0.00 | -78.33 | 0.00 | 78.33 | 836.87 | 418.43 | 703.00 | 347.19 | 17.99 | -1.55 | 0.107 |
| 115.00 | -22.10 | -3.00 | 0.00 | -76.83 | 0.00 | 76.83 | 834.99 | 417.50 | 698.71 | 345.06 | 18.16 | -1.56 | 0.105 |
| 115.50 | -21.96 | -2.99 | 0.00 | -75.33 | 0.00 | 75.33 | 833.11 | 416.56 | 694.42 | 342.95 | 18.32 | -1.57 | 0.103 |
| 116.00 | -21.82 | -2.98 | 0.00 | -73.83 | 0.00 | 73.83 | 831.22 | 415.61 | 690.13 | 340.83 | 18.48 | -1.57 | 0.102 |
| 116.50 | -21.67 | -2.97 | 0.00 | -72.35 | 0.00 | 72.35 | 829.32 | 414.66 | 685.85 | 338.71 | 18.65 | -1.58 | 0.100 |
| 116.50 | -21.67 | -2.97 | 0.00 | -72.35 | 0.00 | 72.35 | 829.32 | 414.66 | 685.85 | 338.71 | 18.65 | -1.58 | 0.240 |
| 117.00 | -21.56 | -2.96 | 0.00 | -70.86 | 0.00 | 70.86 | 827.41 | 413.70 | 681.57 | 336.60 | 18.82 | -1.59 | 0.237 |
| 117.50 | -21.45 | -2.95 | 0.00 | -69.38 | 0.00 | 69.38 | 825.48 | 412.74 | 677.29 | 334.49 | 18.98 | -1.60 | 0.233 |
| 118.00 | -21.33 | -2.95 | 0.00 | -67.90 | 0.00 | 67.90 | 823.55 | 411.77 | 673.02 | 332.38 | 19.15 | -1.62 | 0.230 |
| 118.50 | -21.23 | -2.94 | 0.00 | -66.43 | 0.00 | 66.43 | 821.61 | 410.80 | 668.75 | 330.27 | 19.32 | -1.64 | 0.227 |
| 119.00 | -21.12 | -2.94 | 0.00 | -64.96 | 0.00 | 64.96 | 819.65 | 409.83 | 664.49 | 328.17 | 19.49 | -1.65 | 0.224 |
| 119.50 | -21.01 | -2.93 | 0.00 | -63.49 | 0.00 | 63.49 | 817.69 | 408.84 | 660.23 | 326.06 | 19.67 | -1.67 | 0.220 |
| 120.00 | -20.90 | -2.93 | 0.00 | -62.02 | 0.00 | 62.02 | 815.71 | 407.86 | 655.98 | 323.96 | 19.84 | -1.68 | 0.217 |
| 120.50 | -20.79 | -2.92 | 0.00 | -60.56 | 0.00 | 60.56 | 813.73 | 406.86 | 651.73 | 321.87 | 20.02 | -1.70 | 0.214 |
| 121.00 | -20.69 | -2.91 | 0.00 | -59.10 | 0.00 | 59.10 | 811.73 | 405.86 | 647.49 | 319.77 | 20.20 | -1.71 | 0.210 |
| 121.50 | -20.58 | -2.91 | 0.00 | -57.64 | 0.00 | 57.64 | 809.72 | 404.86 | 643.25 | 317.68 | 20.38 | -1.73 | 0.207 |
| 122.00 | -20.47 | -2.90 | 0.00 | -56.19 | 0.00 | 56.19 | 807.71 | 403.85 | 639.01 | 315.58 | 20.56 | -1.74 | 0.203 |
| 122.50 | -20.37 | -2.90 | 0.00 | -54.74 | 0.00 | 54.74 | 805.68 | 402.84 | 634.78 | 313.49 | 20.74 | -1.76 | 0.200 |
| 123.00 | -20.26 | -2.89 | 0.00 | -53.29 | 0.00 | 53.29 | 803.64 | 401.82 | 630.56 | 311.41 | 20.93 | -1.77 | 0.196 |
| 123.50 | -20.15 | -2.88 | 0.00 | -51.85 | 0.00 | 51.85 | 801.59 | 400.80 | 626.34 | 309.32 | 21.11 | -1.78 | 0.193 |
| 124.00 | -20.05 | -2.88 | 0.00 | -50.40 | 0.00 | 50.40 | 799.54 | 399.77 | 622.12 | 307.24 | 21.30 | -1.80 | 0.189 |
| 124.50 | -19.94 | -2.87 | 0.00 | -48.97 | 0.00 | 48.97 | 797.47 | 398.73 | 617.91 | 305.16 | 21.49 | -1.81 | 0.186 |
| 125.00 | -19.83 | -2.86 | 0.00 | -47.53 | 0.00 | 47.53 | 795.39 | 397.69 | 613.71 | 303.09 | 21.68 | -1.83 | 0.182 |
| 125.50 | -19.73 | -2.86 | 0.00 | -46.10 | 0.00 | 46.10 | 793.30 | 396.65 | 609.51 | 301.01 | 21.87 | -1.84 | 0.178 |
| 126.00 | -19.62 | -2.85 | 0.00 | -44.67 | 0.00 | 44.67 | 791.20 | 395.60 | 605.32 | 298.94 | 22.07 | -1.85 | 0.174 |
| 126.50 | -19.52 | -2.84 | 0.00 | -43.25 | 0.00 | 43.25 | 789.09 | 394.54 | 601.13 | 296.88 | 22.26 | -1.86 | 0.170 |
| 127.00 | -19.41 | -2.83 | 0.00 | -41.83 | 0.00 | 41.83 | 786.97 | 393.48 | 596.95 | 294.81 | 22.46 | -1.88 | 0.167 |
| 127.50 | -19.31 | -2.83 | 0.00 | -40.41 | 0.00 | 40.41 | 784.84 | 392.42 | 592.78 | 292.75 | 22.65 | -1.89 | 0.163 |
| 128.00 | -19.20 | -2.82 | 0.00 | -39.00 | 0.00 | 39.00 | 782.69 | 391.35 | 588.61 | 290.69 | 22.85 | -1.90 | 0.159 |
| 128.50 | -19.10 | -2.81 | 0.00 | -37.59 | 0.00 | 37.59 | 780.54 | 390.27 | 584.44 | 288.64 | 23.05 | -1.91 | 0.155 |
| 129.00 | -18.99 | -2.80 | 0.00 | -36.18 | 0.00 | 36.18 | 778.38 | 389.19 | 580.29 | 286.58 | 23.25 | -1.92 | 0.151 |
| 129.50 | -18.89 | -2.80 | 0.00 | -34.78 | 0.00 | 34.78 | 776.21 | 388.10 | 576.14 | 284.53 | 23.46 | -1.93 | 0.147 |
| 130.00 | -18.78 | -2.79 | 0.00 | -33.38 | 0.00 | 33.38 | 774.02 | 387.01 | 572.00 | 282.49 | 23.66 | -1.95 | 0.142 |
| 130.50 | -18.68 | -2.78 | 0.00 | -31.99 | 0.00 | 31.99 | 771.83 | 385.91 | 567.86 | 280.44 | 23.86 | -1.96 | 0.138 |
| 131.00 | -11.04 | -1.69 | 0.00 | -30.60 | 0.00 | 30.60 | 769.63 | 384.81 | 563.73 | 278.40 | 24.07 | -1.97 | 0.124 |
| 131.50 | -10.96 | -1.68 | 0.00 | -29.75 | 0.00 | 29.75 | 767.41 | 383.71 | 559.60 | 276.37 | 24.28 | -1.98 | 0.122 |
| 132.00 | -10.89 | -1.68 | 0.00 | -28.91 | 0.00 | 28.91 | 765.19 | 382.59 | 555.49 | 274.33 | 24.48 | -1.99 | 0.120 |
| 132.50 | -10.81 | -1.67 | 0.00 | -28.07 | 0.00 | 28.07 | 762.95 | 381.48 | 551.38 | 272.31 | 24.69 | -2.00 | 0.117 |
| 133.00 | -10.74 | -1.66 | 0.00 | -27.24 | 0.00 | 27.24 | 760.71 | 380.35 | 547.28 | 270.28 | 24.90 | -2.00 | 0.115 |
| 133.50 | -10.67 | -1.65 | 0.00 | -26.41 | 0.00 | 26.41 | 758.45 | 379.23 | 543.18 | 268.26 | 25.11 | -2.01 | 0.113 |
| 134.00 | -10.59 | -1.64 | 0.00 | -25.59 | 0.00 | 25.59 | 756.18 | 378.09 | 539.09 | 266.24 | 25.32 | -2.02 | 0.110 |
| 134.50 | -10.52 | -1.63 | 0.00 | -24.77 | 0.00 | 24.77 | 753.91 | 376.95 | 535.01 | 264.22 | 25.53 | -2.03 | 0.108 |
| 135.00 | -10.44 | -1.62 | 0.00 | -23.95 | 0.00 | 23.95 | 751.62 | 375.81 | 530.94 | 262.21 | 25.75 | -2.04 | 0.105 |
| 135.50 | -10.37 | -1.61 | 0.00 | -23.14 | 0.00 | 23.14 | 749.32 | 374.66 | 526.87 | 260.20 | 25.96 | -2.05 | 0.103 |



| Site Number: <br> Site Name: <br> Customer: | 302494 | Code: ANSI/TIA-222-G <br> Engineering Number: OAA712589_C3_05 |  | ©2007-2018 by ATC IP LLC. All rights reserved.4/24/2018 5:54:17 PM |
| :---: | :---: | :---: | :---: | :---: |
|  | Hddm - Haddam, CT |  |  |  |
|  | SPRINT NEXTEL |  |  |  |
| Load Case: $1.0 \mathrm{D}+1.0 \mathrm{~W}$ |  | Serviceability 60 mph |  | 38 Iterations |
| Gust Response Factor : 1.10 Dead Load Factor : 1.00 <br> Wind Load Factor : 1.00 |  |  |  | Wind Importance Factor : 1.00 |
|  |  |  |  |
|  |  |  |  |

Applied Segment Forces Summary

|  |  | Shaft Forces |  | Discrete Forces |  |  |  | Linear Forces |  | Sum of Forces |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Seg Elev <br> (ft) | Description | Wind FX <br> (lb) | Dead <br> Load <br> (lb) | Wind FX <br> (b) | $\begin{gathered} \text { Torsion } \\ \text { MY } \\ \text { (lb-ft) } \end{gathered}$ | Moment MZ <br> (lb-ft) | Dead <br> Load <br> (b) | Wind FX <br> (lb) | Dead Load ( lb ) | Wind FX <br> (Ib) | Dead <br> Load <br> (lb) | Torsion MY (lb-ft) | Moment MZ <br> (lb) |
| 0.00 |  | 5.4 | 0.0 |  |  |  |  | 0.0 | 0.0 | 5.4 | 0.0 | 0.0 | 0.0 |
| 0.50 |  | 10.8 | 75.9 |  |  |  |  | 0.0 | 44.6 | 10.8 | 120.6 | 0.0 | 0.0 |
| 1.00 |  | 10.8 | 75.8 |  |  |  |  | 0.0 | 44.6 | 10.8 | 120.4 | 0.0 | 0.0 |
| 1.50 |  | 10.8 | 75.6 |  |  |  |  | 0.0 | 44.6 | 10.8 | 120.2 | 0.0 | 0.0 |
| 2.00 |  | 10.8 | 75.5 |  |  |  |  | 0.0 | 44.6 | 10.8 | 120.1 | 0.0 | 0.0 |
| 2.50 |  | 10.8 | 75.3 |  |  |  |  | 0.0 | 44.6 | 10.8 | 119.9 | 0.0 | 0.0 |
| 3.00 |  | 10.7 | 75.1 |  |  |  |  | 0.0 | 44.6 | 10.7 | 119.8 | 0.0 | 0.0 |
| 3.50 |  | 10.7 | 75.0 |  |  |  |  | 0.0 | 44.6 | 10.7 | 119.6 | 0.0 | 0.0 |
| 4.00 |  | 10.7 | 74.8 |  |  |  |  | 0.0 | 44.6 | 10.7 | 119.4 | 0.0 | 0.0 |
| 4.50 |  | 10.7 | 74.7 |  |  |  |  | 0.0 | 44.6 | 10.7 | 119.3 | 0.0 | 0.0 |
| 5.00 |  | 10.6 | 74.5 |  |  |  |  | 0.0 | 44.6 | 10.6 | 119.1 | 0.0 | 0.0 |
| 5.50 |  | 10.6 | 74.3 |  |  |  |  | 0.0 | 44.6 | 10.6 | 119.0 | 0.0 | 0.0 |
| 6.00 |  | 10.6 | 74.2 |  |  |  |  | 0.0 | 44.6 | 10.6 | 118.8 | 0.0 | 0.0 |
| 6.50 |  | 10.6 | 74.0 |  |  |  |  | 0.0 | 44.6 | 10.6 | 118.6 | 0.0 | 0.0 |
| 7.00 |  | 10.6 | 73.9 |  |  |  |  | 0.0 | 44.6 | 10.6 | 118.5 | 0.0 | 0.0 |
| 7.50 |  | 10.5 | 73.7 |  |  |  |  | 0.0 | 44.6 | 10.5 | 118.3 | 0.0 | 0.0 |
| 8.00 |  | 10.5 | 73.5 |  |  |  |  | 0.0 | 44.6 | 10.5 | 118.2 | 0.0 | 0.0 |
| 8.50 |  | 10.5 | 73.4 |  |  |  |  | 0.0 | 67.4 | 10.5 | 140.8 | 0.0 | 0.0 |
| 9.00 |  | 10.5 | 73.2 |  |  |  |  | 0.0 | 67.4 | 10.5 | 140.6 | 0.0 | 0.0 |
| 9.50 |  | 10.4 | 73.0 |  |  |  |  | 0.0 | 67.4 | 10.4 | 140.5 | 0.0 | 0.0 |
| 10.00 |  | 10.4 | 72.9 |  |  |  |  | 0.0 | 67.4 | 10.4 | 140.3 | 0.0 | 0.0 |
| 10.50 |  | 10.4 | 72.7 |  |  |  |  | 0.0 | 67.4 | 10.4 | 140.1 | 0.0 | 0.0 |
| 11.00 |  | 10.4 | 72.6 |  |  |  |  | 0.0 | 67.4 | 10.4 | 140.0 | 0.0 | 0.0 |
| 11.50 |  | 10.3 | 72.4 |  |  |  |  | 0.0 | 67.4 | 10.3 | 139.8 | 0.0 | 0.0 |
| 12.00 |  | 10.3 | 72.2 |  |  |  |  | 0.0 | 67.4 | 10.3 | 139.7 | 0.0 | 0.0 |
| 12.50 |  | 10.3 | 72.1 |  |  |  |  | 0.0 | 67.4 | 10.3 | 139.5 | 0.0 | 0.0 |
| 13.00 |  | 10.3 | 71.9 |  |  |  |  | 0.0 | 67.4 | 10.3 | 139.3 | 0.0 | 0.0 |
| 13.50 |  | 10.3 | 71.8 |  |  |  |  | 0.0 | 67.4 | 10.3 | 139.2 | 0.0 | 0.0 |
| 14.00 |  | 10.2 | 71.6 |  |  |  |  | 0.0 | 67.4 | 10.2 | 139.0 | 0.0 | 0.0 |
| 14.50 |  | 10.2 | 71.4 |  |  |  |  | 0.0 | 67.4 | 10.2 | 138.9 | 0.0 | 0.0 |
| 15.00 |  | 10.2 | 71.3 |  |  |  |  | 0.0 | 67.4 | 10.2 | 138.7 | 0.0 | 0.0 |
| 15.50 |  | 10.2 | 71.1 |  |  |  |  | 0.0 | 67.4 | 10.2 | 138.5 | 0.0 | 0.0 |
| 16.00 |  | 10.1 | 71.0 |  |  |  |  | 0.0 | 67.4 | 10.1 | 138.4 | 0.0 | 0.0 |
| 16.50 |  | 10.1 | 70.8 |  |  |  |  | 0.0 | 67.4 | 10.1 | 138.2 | 0.0 | 0.0 |
| 17.00 |  | 10.1 | 70.6 |  |  |  |  | 0.0 | 67.4 | 10.1 | 138.1 | 0.0 | 0.0 |
| 17.50 |  | 10.1 | 70.5 |  |  |  |  | 0.0 | 67.4 | 10.1 | 137.9 | 0.0 | 0.0 |
| 18.00 |  | 10.1 | 70.3 |  |  |  |  | 0.0 | 67.4 | 10.1 | 137.7 | 0.0 | 0.0 |
| 18.50 |  | 10.0 | 70.1 |  |  |  |  | 0.0 | 67.4 | 10.0 | 137.6 | 0.0 | 0.0 |
| 19.00 |  | 10.0 | 70.0 |  |  |  |  | 0.0 | 67.4 | 10.0 | 137.4 | 0.0 | 0.0 |
| 19.50 |  | 10.0 | 69.8 |  |  |  |  | 0.0 | 67.4 | 10.0 | 137.3 | 0.0 | 0.0 |
| 20.00 |  | 10.0 | 69.7 |  |  |  |  | 0.0 | 67.4 | 10.0 | 137.1 | 0.0 | 0.0 |
| 20.50 |  | 9.9 | 69.5 |  |  |  |  | 0.0 | 67.4 | 9.9 | 136.9 | 0.0 | 0.0 |
| 21.00 |  | 9.9 | 69.3 |  |  |  |  | 0.0 | 67.4 | 9.9 | 136.8 | 0.0 | 0.0 |
| 21.50 |  | 9.9 | 69.2 |  |  |  |  | 0.0 | 67.4 | 9.9 | 136.6 | 0.0 | 0.0 |
| 22.00 |  | 9.9 | 69.0 |  |  |  |  | 0.0 | 67.4 | 9.9 | 136.4 | 0.0 | 0.0 |
| 22.50 |  | 9.8 | 68.9 |  |  |  |  | 0.0 | 67.4 | 9.8 | 136.3 | 0.0 | 0.0 |
| 23.00 |  | 9.8 | 68.7 |  |  |  |  | 0.0 | 67.4 | 9.8 | 136.1 | 0.0 | 0.0 |
| 23.50 |  | 9.8 | 68.5 |  |  |  |  | 0.0 | 67.4 | 9.8 | 136.0 | 0.0 | 0.0 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589 C3 05 |

Customer: SPRINT NEXTEL

| Load Case: $1.0 \mathrm{D}+1.0 \mathrm{~W}$ |  |  | Serviceability 60 mph |  |  |  |  | 1 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 <br> Dead Load Factor: 1.00 <br> Wind Load Factor: 1.00 |  |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
| 24.00 |  | 9.8 | 68.4 | 0.0 | 67.4 | 9.8 | 135.8 | 0.0 | 0.0 |
| 24.50 |  | 9.8 | 68.2 | 0.0 | 67.4 | 9.8 | 135.6 | 0.0 | 0.0 |
| 25.00 |  | 9.7 | 68.1 | 0.0 | 67.4 | 9.7 | 135.5 | 0.0 | 0.0 |
| 25.50 |  | 9.7 | 67.9 | 0.0 | 67.4 | 9.7 | 135.3 | 0.0 | 0.0 |
| 26.00 |  | 9.7 | 67.7 | 0.0 | 67.4 | 9.7 | 135.2 | 0.0 | 0.0 |
| 26.50 |  | 9.7 | 67.6 | 0.0 | 67.4 | 9.7 | 135.0 | 0.0 | 0.0 |
| 27.00 |  | 9.6 | 67.4 | 0.0 | 67.4 | 9.6 | 134.8 | 0.0 | 0.0 |
| 27.50 |  | 9.6 | 67.3 | 0.0 | 67.4 | 9.6 | 134.7 | 0.0 | 0.0 |
| 28.00 |  | 9.6 | 67.1 | 0.0 | 67.4 | 9.6 | 134.5 | 0.0 | 0.0 |
| 28.50 |  | 9.6 | 66.9 | 0.0 | 67.4 | 9.6 | 134.4 | 0.0 | 0.0 |
| 29.00 |  | 9.5 | 66.8 | 0.0 | 67.4 | 9.5 | 134.2 | 0.0 | 0.0 |
| 29.50 |  | 9.5 | 66.6 | 0.0 | 67.4 | 9.5 | 134.0 | 0.0 | 0.0 |
| 30.00 |  | 9.5 | 66.4 | 0.0 | 67.4 | 9.5 | 133.9 | 0.0 | 0.0 |
| 30.50 |  | 9.5 | 66.3 | 0.0 | 67.4 | 9.5 | 133.7 | 0.0 | 0.0 |
|  |  | 9.6 | 66.1 | 0.0 | 67.4 | 9.6 | 133.5 | 0.0 | 0.0 |
| 31.5032.00 Bot - Section 2 |  | 9.7 | 66.0 | 0.0 | 67.4 | 9.7 | 133.4 | 0.0 | 0.0 |
|  |  | 9.8 | 121.8 | 0.0 | 67.4 | 9.8 | 189.3 | 0.0 | 0.0 |
| 32.50 |  | 9.8 | 121.5 | 0.0 | 67.4 | 9.8 | 188.9 | 0.0 | 0.0 |
| 33.00 |  | 9.8 | 121.2 | 0.0 | 67.4 | 9.8 | 188.6 | 0.0 | 0.0 |
| 33.50 |  | 9.8 | 120.9 | 0.0 | 67.4 | 9.8 | 188.4 | 0.0 | 0.0 |
| 34.00 |  | 9.9 | 120.6 | 0.0 | 67.4 | 9.9 | 188.1 | 0.0 | 0.0 |
| 34.50 |  | 9.9 | 120.3 | 0.0 | 67.4 | 9.9 | 187.8 | 0.0 | 0.0 |
| 35.00 |  | 9.9 | 120.0 | 0.0 | 67.4 | 9.9 | 187.5 | 0.0 | 0.0 |
| 35.50 |  | 6.6 | 119.7 | 0.0 | 67.4 | 6.6 | 187.2 | 0.0 | 0.0 |
| 35.6736.00 Top - Se |  | 5.0 | 39.8 | 0.0 | 22.5 | 5.0 | 62.3 | 0.0 | 0.0 |
|  |  | 8.3 | 36.6 | 0.0 | 45.0 | 8.3 | 81.6 | 0.0 | 0.0 |
| 36.50 |  | 6.7 | 54.8 | 0.0 | 67.4 | 6.7 | 122.2 | 0.0 | 0.0 |
| 36.67 | Reinf. Top Reinf | 5.0 | 18.6 | 0.0 | 22.9 | 5.0 | 41.5 | 0.0 | 0.0 |
| 37.00 |  | 8.3 | 36.1 | 0.0 | 40.3 | 8.3 | 76.4 | 0.0 | 0.0 |
| 37.50 |  | 10.0 | 54.5 | 0.0 | 61.0 | 10.0 | 115.6 | 0.0 | 0.0 |
| 38.00 |  | 10.0 | 54.4 | 0.0 | 61.0 | 10.0 | 115.5 | 0.0 | 0.0 |
| 38.50 |  | 10.0 | 54.3 | 0.0 | 61.0 | 10.0 | 115.3 | 0.0 | 0.0 |
| 39.00 |  | 10.0 | 54.1 | 0.0 | 61.0 | 10.0 | 115.2 | 0.0 | 0.0 |
| 39.50 |  | 10.0 | 54.0 | 0.0 | 61.0 | 10.0 | 115.0 | 0.0 | 0.0 |
| 40.00 |  | 10.0 | 53.9 | 0.0 | 61.0 | 10.0 | 114.9 | 0.0 | 0.0 |
| 40.50 |  | 10.0 | 53.7 | 0.0 | 61.0 | 10.0 | 114.8 | 0.0 | 0.0 |
| 41.00 |  | 10.0 | 53.6 | 0.0 | 61.0 | 10.0 | 114.6 | 0.0 | 0.0 |
| 41.50 |  | 10.1 | 53.5 | 0.0 | 61.0 | 10.1 | 114.5 | 0.0 | 0.0 |
| 42.00 |  | 10.1 | 53.3 | 0.0 | 61.0 | 10.1 | 114.4 | 0.0 | 0.0 |
| 42.50 |  | 10.1 | 53.2 | 0.0 | 61.0 | 10.1 | 114.2 | 0.0 | 0.0 |
| 43.00 |  | 10.1 | 53.1 | 0.0 | 61.0 | 10.1 | 114.1 | 0.0 | 0.0 |
| 43.50 |  | 10.1 | 52.9 52.8 | 0.0 | 61.0 | 10.1 | 114.0 | 0.0 | 0.0 |
| 44.50 |  | 10.1 10.1 | 52.8 52.7 | 0.0 0.0 | 61.0 61.0 | 10.1 10.1 | 113.8 113.7 | 0.0 0.0 | 0.0 0.0 |
| 45.00 |  | 10.1 | 52.5 | 0.0 | 61.0 | 10.1 | 113.6 | 0.0 | 0.0 |
| 45.50 |  | 10.1 | 52.4 | 0.0 | 61.0 | 10.1 | 113.4 | 0.0 | 0.0 |
| 46.00 |  | 10.1 | 52.3 | 0.0 | 61.0 | 10.1 | 113.3 | 0.0 | 0.0 |
| 46.50 |  | 10.1 | 52.1 | 0.0 | 61.0 | 10.1 | 113.2 | 0.0 | 0.0 |
| 47.00 |  | 10.1 | 52.0 | 0.0 | 61.0 | 10.1 | 113.0 | 0.0 | 0.0 |
| 47.50 |  | 10.1 | 51.9 | 0.0 | 61.0 | 10.1 | 112.9 | 0.0 | 0.0 |
| 48.00 |  | 10.1 | 51.7 | 0.0 | 61.0 | 10.1 | 112.8 | 0.0 | 0.0 |
| 48.50 |  | 10.2 | 51.6 | 0.0 | 61.0 | 10.2 | 112.6 | 0.0 | 0.0 |
| 49.00 |  | 10.2 | 51.5 | 0.0 | 61.0 | 10.2 | 112.5 | 0.0 | 0.0 |
| 49.50 |  | 10.2 | 51.3 | 0.0 | 61.0 | 10.2 | 112.4 | 0.0 | 0.0 |
| 50.00 |  | 10.2 | 51.2 | 0.0 | 61.0 | 10.2 | 112.2 | 0.0 | 0.0 |
| 50.50 |  | 10.2 | 51.0 | 0.0 | 61.0 | 10.2 | 112.1 | 0.0 | 0.0 |
| 51.00 |  | 10.2 | 50.9 | 0.0 | 61.0 | 10.2 | 112.0 | 0.0 | 0.0 |

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| :--- | :--- | :--- | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 20185: 54: 36$ PM |
| Customer: | SPRINT NEXTEL |  |  |  |



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| Site Number: | 302494 |  | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 2018$ |
| Customer: | SPRINT NEXTEL |  |  |  |



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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @007-2018 by ATC IP LLC. All rights reserved. |
| :---: | :---: | :---: | :---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | 4/24/2018 5:54:36 |

Customer: $\quad$ SPRINT NEXTEL


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| Site Number: | 302494 |  |  |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: ANSI/TIA-222-G | CP2007-2018 by ATC IP LLC. All rights reserved. |
| Customer: | SPRINT NEXTEL |  | $4 / 24 / 2018$ 5:54:36 PM |



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## Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{aligned} & \mathrm{Pu} \\ & \mathrm{FY}(-) \\ & \text { (kips) } \end{aligned}$ | $\begin{aligned} & \text { Vu } \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ |  |  | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | phi Pn <br> (kips) | $\begin{gathered} \mathrm{phi} \\ \mathrm{Vn} \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \mathrm{phi} \\ \text { Tn } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{phi} \\ \mathrm{Mn} \\ \text { (ft-kips) } \end{gathered}$ | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -35.07 | -4.65 | 0.00 | -489.81 | 0.00 | 489.81 | 3,157.17 | 1,578.58 | 4,812.28 | 2,376.61 | 0.00 | 0.00 | 0.133 |
| 0.50 | -34.95 | -4.64 | 0.00 | -487.48 | 0.00 | 487.48 | 3,152.93 | 1,576.47 | 4,795.55 | 2,368.34 | 0.00 | -0.01 | 0.133 |
| 1.00 | -34.83 | -4.64 | 0.00 | -485.16 | 0.00 | 485.16 | 3,148.69 | 1,574.34 | 4,778.83 | 2,360.09 | 0.00 | -0.01 | 0.133 |
| 1.50 | -34.71 | -4.63 | 0.00 | -482.84 | 0.00 | 482.84 | 3,144.43 | 1,572.22 | 4,762.13 | 2,351.84 | 0.00 | -0.02 | 0.132 |
| 2.00 | -34.59 | -4.62 | 0.00 | -480.53 | 0.00 | 480.53 | 3,140.17 | 1,570.08 | 4,745.43 | 2,343.59 | 0.00 | -0.02 | 0.132 |
| 2.50 | -34.47 | -4.61 | 0.00 | -478.22 | 0.00 | 478.22 | 3,135.89 | 1,567.94 | 4,728.75 | 2,335.35 | 0.01 | -0.03 | 0.132 |
| 3.00 | -34.35 | -4.61 | 0.00 | -475.91 | 0.00 | 475.91 | 3,131.60 | 1,565.80 | 4,712.08 | 2,327.12 | 0.01 | -0.03 | 0.131 |
| 3.50 | -34.23 | -4.60 | 0.00 | -473.61 | 0.00 | 473.61 | 3,127.31 | 1,563.65 | 4,695.42 | 2,318.89 | 0.01 | -0.04 | 0.131 |
| 4.00 | -34.11 | -4.59 | 0.00 | -471.31 | 0.00 | 471.31 | 3,123.00 | 1,561.50 | 4,678.77 | 2,310.67 | 0.02 | -0.04 | 0.131 |
| 4.50 | -33.99 | -4.58 | 0.00 | -469.01 | 0.00 | 469.01 | 3,118.68 | 1,559.34 | 4,662.14 | 2,302.45 | 0.02 | -0.05 | 0.130 |
| 5.00 | -33.87 | -4.58 | 0.00 | -466.72 | 0.00 | 466.72 | 3,114.35 | 1,557.18 | 4,645.51 | 2,294.24 | 0.03 | -0.05 | 0.130 |
| 5.50 | -33.75 | -4.57 | 0.00 | -464.43 | 0.00 | 464.43 | 3,110.02 | 1,555.01 | 4,628.91 | 2,286.04 | 0.04 | -0.06 | 0.130 |
| 6.00 | -33.63 | -4.56 | 0.00 | -462.15 | 0.00 | 462.15 | 3,105.67 | 1,552.83 | 4,612.31 | 2,277.85 | 0.04 | -0.07 | 0.130 |
| 6.50 | -33.51 | -4.55 | 0.00 | -459.87 | 0.00 | 459.87 | 3,101.31 | 1,550.65 | 4,595.73 | 2,269.66 | 0.05 | -0.07 | 0.129 |
| 7.00 | -33.39 | -4.55 | 0.00 | -457.59 | 0.00 | 457.59 | 3,096.94 | 1,548.47 | 4,579.16 | 2,261.47 | 0.06 | -0.08 | 0.129 |
| 7.50 | -33.28 | -4.54 | 0.00 | -455.32 | 0.00 | 455.32 | 3,092.56 | 1,546.28 | 4,562.60 | 2,253.30 | 0.07 | -0.08 | 0.129 |
| 8.00 | -33.16 | -4.53 | 0.00 | -453.05 | 0.00 | 453.05 | 3,088.17 | 1,544.08 | 4,546.06 | 2,245.13 | 0.07 | -0.09 | 0.128 |
| 8.50 | -33.02 | -4.52 | 0.00 | -450.79 | 0.00 | 450.79 | 3,083.77 | 1,541.88 | 4,529.53 | 2,236.96 | 0.08 | -0.09 | 0.128 |
| 9.00 | -32.87 | -4.52 | 0.00 | -448.52 | 0.00 | 448.52 | 3,079.36 | 1,539.68 | 4,513.01 | 2,228.81 | 0.09 | -0.10 | 0.128 |
| 9.50 | -32.73 | -4.51 | 0.00 | -446.27 | 0.00 | 446.27 | 3,074.94 | 1,537.47 | 4,496.51 | 2,220.66 | 0.10 | -0.10 | 0.127 |
| 10.00 | -32.59 | -4.50 | 0.00 | -444.01 | 0.00 | 444.01 | 3,070.50 | 1,535.25 | 4,480.02 | 2,212.51 | 0.12 | -0.11 | 0.127 |
| 10.50 | -32.45 | -4.49 | 0.00 | -441.76 | 0.00 | 441.76 | 3,066.06 | 1,533.03 | 4,463.54 | 2,204.38 | 0.13 | -0.12 | 0.127 |
| 11.00 | -32.31 | -4.49 | 0.00 | -439.52 | 0.00 | 439.52 | 3,061.61 | 1,530.80 | 4,447.08 | 2,196.25 | 0.14 | -0.12 | 0.126 |
| 11.50 | -32.17 | -4.48 | 0.00 | -437.27 | 0.00 | 437.27 | 3,057.15 | 1,528.57 | 4,430.63 | 2,188.12 | 0.15 | -0.13 | 0.126 |
| 12.00 | -32.03 | -4.47 | 0.00 | -435.03 | 0.00 | 435.03 | 3,052.67 | 1,526.34 | 4,414.20 | 2,180.01 | 0.17 | -0.13 | 0.126 |
| 12.50 | -31.89 | -4.46 | 0.00 | -432.80 | 0.00 | 432.80 | 3,048.19 | 1,524.09 | 4,397.78 | 2,171.90 | 0.18 | -0.14 | 0.126 |
| 13.00 | -31.75 | -4.46 | 0.00 | -430.57 | 0.00 | 430.57 | 3,043.69 | 1,521.85 | 4,381.37 | 2,163.80 | 0.19 | -0.14 | 0.125 |
| 13.50 | -31.61 | -4.45 | 0.00 | -428.34 | 0.00 | 428.34 | 3,039.19 | 1,519.59 | 4,364.98 | 2,155.70 | 0.21 | -0.15 | 0.125 |
| 14.00 | -31.47 | -4.44 | 0.00 | -426.12 | 0.00 | 426.12 | 3,034.67 | 1,517.34 | 4,348.61 | 2,147.61 | 0.23 | -0.15 | 0.125 |
| 14.50 | -31.33 | -4.43 | 0.00 | -423.90 | 0.00 | 423.90 | 3,030.15 | 1,515.07 | 4,332.24 | 2,139.53 | 0.24 | -0.16 | 0.124 |
| 15.00 | -31.19 | -4.43 | 0.00 | -421.68 | 0.00 | 421.68 | 3,025.61 | 1,512.81 | 4,315.90 | 2,131.46 | 0.26 | -0.16 | 0.124 |
| 15.50 | -31.06 | -4.42 | 0.00 | -419.47 | 0.00 | 419.47 | 3,021.07 | 1,510.53 | 4,299.57 | 2,123.39 | 0.28 | -0.17 | 0.124 |
| 16.00 | -30.92 | -4.41 | 0.00 | -417.26 | 0.00 | 417.26 | 3,016.51 | 1,508.25 | 4,283.25 | 2,115.33 | 0.30 | -0.18 | 0.123 |
| 16.50 | -30.78 | -4.40 | 0.00 | -415.05 | 0.00 | 415.05 | 3,011.94 | 1,505.97 | 4,266.95 | 2,107.28 | 0.31 | -0.18 | 0.123 |
| 17.00 | -30.64 | -4.39 | 0.00 | -412.85 | 0.00 | 412.85 | 3,007.37 | 1,503.68 | 4,250.66 | 2,099.24 | 0.33 | -0.19 | 0.123 |
| 17.50 | -30.50 | -4.39 | 0.00 | -410.66 | 0.00 | 410.66 | 3,002.78 | 1,501.39 | 4,234.39 | 2,091.20 | 0.35 | -0.19 | 0.122 |
| 18.00 | -30.36 | -4.38 | 0.00 | -408.46 | 0.00 | 408.46 | 2,998.18 | 1,499.09 | 4,218.13 | 2,083.18 | 0.37 | -0.20 | 0.122 |
| 18.50 | -30.23 | -4.37 | 0.00 | -406.27 | 0.00 | 406.27 | 2,993.57 | 1,496.79 | 4,201.89 | 2,075.15 | 0.39 | -0.20 | 0.122 |
| 19.00 | -30.09 | -4.36 | 0.00 | -404.09 | 0.00 | 404.09 | 2,988.95 | 1,494.48 | 4,185.66 | 2,067.14 | 0.42 | -0.21 | 0.121 |
| 19.50 | -29.95 | -4.36 | 0.00 | -401.90 | 0.00 | 401.90 | 2,984.32 | 1,492.16 | 4,169.45 | 2,059.13 | 0.44 | -0.21 | 0.121 |
| 20.00 | -29.81 | -4.35 | 0.00 | -399.73 | 0.00 | 399.73 | 2,979.68 | 1,489.84 | 4,153.25 | 2,051.14 | 0.46 | -0.22 | 0.121 |
| 20.50 | -29.68 | -4.34 | 0.00 | -397.55 | 0.00 | 397.55 | 2,975.03 | 1,487.52 | 4,137.08 | 2,043.15 | 0.49 | -0.23 | 0.120 |
| 21.00 | -29.54 | -4.33 | 0.00 | -395.38 | 0.00 | 395.38 | 2,970.37 | 1,485.19 | 4,120.91 | 2,035.16 | 0.51 | -0.23 | 0.120 |
| 21.50 | -29.40 | -4.33 | 0.00 | -393.21 | 0.00 | 393.21 | 2,965.70 | 1,482.85 | 4,104.77 | 2,027.19 | 0.53 | -0.24 | 0.120 |
| 22.00 | -29.26 | -4.32 | 0.00 | -391.05 | 0.00 | 391.05 | 2,961.02 | 1,480.51 | 4,088.63 | 2,019.22 | 0.56 | -0.24 | 0.119 |
| 22.50 | -29.13 | -4.31 | 0.00 | -388.89 | 0.00 | 388.89 | 2,956.33 | 1,478.16 | 4,072.52 | 2,011.26 | 0.58 | -0.25 | 0.119 |
| 23.00 | -28.99 | -4.30 | 0.00 | -386.73 | 0.00 | 386.73 | 2,951.62 | 1,475.81 | 4,056.42 | 2,003.31 | 0.61 | -0.25 | 0.119 |
| 23.50 | -28.85 | -4.30 | 0.00 | -384.58 | 0.00 | 384.58 | 2,946.91 | 1,473.46 | 4,040.34 | 1,995.37 | 0.64 | -0.26 | 0.118 |
| 24.00 | -28.72 | -4.29 | 0.00 | -382.43 | 0.00 | 382.43 | 2,942.19 | 1,471.09 | 4,024.27 | 1,987.44 | 0.67 | -0.27 | 0.118 |
| 24.50 | -28.58 | -4.28 | 0.00 | -380.29 | 0.00 | 380.29 | 2,937.46 | 1,468.73 | 4,008.22 | 1,979.51 | 0.69 | -0.27 | 0.118 |
| 25.00 | -28.45 | -4.27 | 0.00 | -378.15 | 0.00 | 378.15 | 2,932.71 | 1,466.36 | 3,992.19 | 1,971.59 | 0.72 | -0.28 | 0.117 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL


Customer: SPRINT NEXTEL

| Load Case: $1.0 \mathrm{D}+1.0 \mathrm{~W}$ |  |  |  | Serviceability 60 mph |  |  |  |  | 38 Iterations |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor: 1.10 Dead Load Factor: 1.00 Wind Load Factor: 1.00 |  |  |  |  |  |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 52.50 | -21.27 | -3.81 | 0.00 | -266.65 | 0.00 | 266.65 | 2,129.1 | 064.59 | 2,582. | 1,275.64 | 3.24 | -0.61 | 0.120 |
| 53.00 | -21.16 | -3.81 | 0.00 | -264.74 | 0.00 | 264.74 | 2,125.47 | 1,062.73 | $2,571.55$ | 1,269.99 | 3.30 | -0.61 | 0.119 |
| 53.50 | -21.05 | -3.80 | 0.00 | -262.84 | 0.00 | 262.84 | 2,121.75 | 1,060.87 | 2,560.13 | 1,264.35 | 3.37 | -0.62 | 0.119 |
| 54.00 | -20.94 | -3.79 | 0.00 | -260.94 | 0.00 | 260.94 | 2,118.01 | 1,059.01 | 2,548.72 | 1,258.72 | 3.43 | -0.63 | 0.118 |
| 54.50 | -20.82 | -3.78 | 0.00 | -259.05 | 0.00 | 259.05 | 2,114.27 | 1,057.14 | 2,537.32 | $1,253.09$ | 3.50 | -0.63 | 0.118 |
| 55.00 | -20.71 | -3.77 | 0.00 | -257.16 | 0.00 | 257.16 | 2,110.52 | 1,055.26 | 2,525.94 | $1,247.47$ | 3.57 | -0.64 | 0.117 |
| 55.50 | -20.60 | -3.76 | 0.00 | -255.28 | 0.00 | 255.28 | 2,106.75 | 1,053.38 | 2,514.57 | $1,241.85$ | 3.63 | -0.64 | 0.117 |
| 56.00 | -20.49 | -3.75 | 0.00 | -253.40 | 0.00 | 253.40 | 2,102.98 | 1,051.49 | 2,503.21 | 1,236.24 | 3.70 | -0.65 | 0.116 |
| 56.50 | -20.38 | -3.74 | 0.00 | -251.52 | 0.00 | 251.52 | 2,099.20 | 1,049.60 | 2,491.86 | 1,230.64 | 3.77 | -0.66 | 0.116 |
| 57.00 | -20.27 | -3.73 | 0.00 | -249.65 | 0.00 | 249.65 | 2,095.40 | 1,047.70 | 2,480.53 | $1,225.04$ | 3.84 | -0.66 | 0.115 |
| 57.50 | -20.16 | -3.72 | 0.00 | -247.78 | 0.00 | 247.78 | 2,091.60 | 1,045.80 | 2,469.21 | 1,219.45 | 3.91 | -0.67 | 0.115 |
| 58.00 | -20.05 | -3.71 | 0.00 | -245.92 | 0.00 | 245.92 | 2,087.78 | 1,043.89 | 2,457.90 | 1,213.86 | 3.98 | -0.68 | 0.114 |
| 58.50 | -19.94 | -3.70 | 0.00 | -244.06 | 0.00 | 244.06 | 2,083.96 | 1,041.98 | 2,446.60 | $1,208.28$ | 4.05 | -0.68 | 0.114 |
| 59.00 | -19.83 | -3.70 | 0.00 | -242.21 | 0.00 | 242.21 | 2,080.12 | 1,040.06 | 2,435.32 | 1,202.71 | 4.12 | -0.69 | 0.113 |
| 59.50 | -19.72 | -3.69 | 0.00 | -240.36 | 0.00 | 240.36 | 2,076.27 | 1,038.14 | 2,424.04 | 1,197.14 | 4.19 | -0.69 | 0.113 |
| 60.00 | -19.61 | -3.68 | 0.00 | -238.52 | 0.00 | 238.52 | 2,072.41 | 1,036.21 | 2,412.79 | 1,191.58 | 4.27 | -0.70 | 0.112 |
| 60.50 | -19.50 | -3.67 | 0.00 | -236.68 | 0.00 | 236.68 | 2,068.55 | 1,034.27 | 2,401.54 | 1,186.03 | 4.34 | -0.71 | 0.112 |
| 61.00 | -19.39 | -3.66 | 0.00 | -234.85 | 0.00 | 234.85 | 2,064.67 | 1,032.33 | 2,390.31 | 1,180.48 | 4.41 | -0.71 | 0.111 |
| 61.50 | -19.28 | -3.65 | 0.00 | -233.02 | 0.00 | 233.02 | 2,060.78 | 1,030.39 | 2,379.09 | 1,174.94 | 4.49 | -0.72 | 0.111 |
| 62.00 | -19.17 | -3.64 | 0.00 | -231.19 | 0.00 | 231.19 | 2,056.88 | 1,028.44 | 2,367.88 | 1,169.41 | 4.56 | -0.72 | 0.110 |
| 62.50 | -19.06 | -3.63 | 0.00 | -229.38 | 0.00 | 229.38 | 2,052.97 | 1,026.49 | 2,356.69 | 1,163.88 | 4.64 | -0.73 | 0.110 |
| 63.00 | -18.95 | -3.62 | 0.00 | -227.56 | 0.00 | 227.56 | 2,049.05 | 1,024.53 | 2,345.51 | 1,158.36 | 4.72 | -0.74 | 0.109 |
| 63.50 | -18.84 | -3.61 | 0.00 | -225.75 | 0.00 | 225.75 | 2,045.12 | 1,022.56 | 2,334.35 | 1,152.85 | 4.80 | -0.74 | 0.109 |
| 64.00 | -18.74 | -3.60 | 0.00 | -223.94 | 0.00 | 223.94 | 2,041.18 | 1,020.59 | 2,323.20 | 1,147.34 | 4.87 | -0.75 | 0.108 |
| 64.50 | -18.63 | -3.59 | 0.00 | -222.14 | 0.00 | 222.14 | 2,037.23 | 1,018.62 | 2,312.06 | 1,141.84 | 4.95 | -0.76 | 0.107 |
| 65.00 | -18.52 | -3.58 | 0.00 | -220.35 | 0.00 | 220.35 | 2,033.27 | 1,016.64 | 2,300.94 | 1,136.35 | 5.03 | -0.76 | 0.107 |
| 65.50 | -18.41 | -3.57 | 0.00 | -218.56 | 0.00 | 218.56 | 2,029.30 | 1,014.65 | 2,289.83 | 1,130.86 | 5.11 | -0.77 | 0.106 |
| 66.00 | -18.30 | -3.56 | 0.00 | -216.77 | 0.00 | 216.77 | 2,025.32 | 1,012.66 | 2,278.74 | 1,125.38 | 5.19 | -0.77 | 0.106 |
| 66.50 | -18.19 | -3.55 | 0.00 | -214.99 | 0.00 | 214.99 | 2,021.33 | 1,010.66 | 2,267.65 | 1,199.91 | 5.27 | -0.78 | 0.105 |
| 67.00 | -18.09 | -3.54 | 0.00 | -213.21 | 0.00 | 213.21 | 2,016.97 | 1,008.48 | 2,256.19 | 1,114.25 | 5.36 | -0.79 | 0.105 |
| 67.50 | -17.98 | -3.53 | 0.00 | -211.44 | 0.00 | 211.44 | 2,011.16 | 1,005.58 | 2,243.13 | 1,107.80 | 5.44 | -0.79 | 0.104 |
| 68.00 | -17.87 | -3.52 | 0.00 | -209.67 | 0.00 | 209.67 | 2,005.34 | 1,002.67 | 2,230.12 | 1,101.37 | 5.52 | -0.80 | 0.104 |
| 68.50 | -17.76 | -3.52 | 0.00 | -207.91 | 0.00 | 207.91 | 1,999.53 | '999.77 | 2,217.14 | 1,094.96 | 5.61 | -0.80 | 0.104 |
| 69.00 | -17.66 | -3.51 | 0.00 | -206.15 | 0.00 | 206.15 | 1,993.72 | 996.86 | 2,204.19 | ,088.57 | 5.69 | $-0.81$ | 0.103 |
| 69.50 | -17.55 | -3.50 | 0.00 | -204.40 | 0.00 | 204.40 | 1,987.91 | 993.96 | 2,191.29 | ,082.20 | 5.78 | ${ }^{-0.82}$ | 0.103 |
| 70.00 | -17.44 | -3.49 | 0.00 | -202.65 | 0.00 | 202.65 | 1,982.10 | 991.05 | 2,178.42 | ,075.84 | 5.86 | -0.82 | 0.102 |
| 70.50 | -17.30 | -3.48 | 0.00 | -200.91 | 0.00 | 200.91 | 1,976.29 | 988.14 | 2,165.59 | ,069.51 | 5.95 | -0.83 | 0.100 |
| 71.00 | -17.15 | -3.47 | 0.00 | -199.17 | 0.00 | 199.17 | 1,970.48 | 985.24 | 2,152.80 | ,063.19 | 6.04 | -0.83 | 0.100 |
| 71.50 | -17.01 | -3.45 | 0.00 | -197.44 | 0.00 | 197.44 | 1,964.67 | 982.33 | 2,140.05 | ,056.89 | 6.12 | -0.84 | 0.099 |
| 72.00 | -16.87 | -3.44 | 0.00 | -195.71 | 0.00 | 195.71 | 1,958.85 | 979.43 | 2,127.34 | ,050.61 | 6.21 | -0.85 | 0.099 |
| 72.50 | -16.72 | -3.43 | 0.00 | -193.99 | 0.00 | 193.99 | 1,953.04 | 976.52 | 2,114.66 | 1,044.35 | 6.30 | -0.85 | 0.098 |
| 73.00 | -16.58 | -3.42 | 0.00 | -192.27 | 0.00 | 192.27 | 1,947.23 | 973.62 | 2,102.02 | ,038.11 | 6.39 | -0.86 | 0.098 |
| 73.33 | -16.49 | -3.42 | 0.00 | -191.14 | 0.00 | 191.14 | 1,943.40 | 971.70 | 2,093.70 | ,034.00 | 6.45 | ${ }_{-0.86}$ | 0.098 |
| 73.33 | -16.49 | -3.42 | 0.00 | -191.14 | 0.00 | 191.14 | 1,943.40 | 971.70 | 2,093.70 | ,034.00 | 6.45 | -0.86 | 0.107 |
| 73.50 | -16.44 | -3.41 | 0.00 | -190.56 | 0.00 | 190.56 | 1,473.96 | 736.98 | 1,624.57 | 802.32 | 6.48 | ${ }^{-0.86}$ | 0.127 |
| 74.00 | -16.35 | -3.40 | 0.00 | -188.86 | 0.00 | 188.86 | 1,471.41 | 735.71 | 1,616.97 | 798.56 | 6.57 | -0.87 | 0.126 |
| 74.50 | -16.26 | -3.39 | 0.00 | -187.15 | 0.00 | 187.15 | 1,468.85 | 734.43 | 1,609.36 | 794.80 | 6.66 | -0.88 | 0.126 |
| 75.00 | -16.16 | -3.38 | 0.00 | -185.46 | 0.00 | 185.46 | 1,466.28 | 733.14 | 1,601.77 | 791.05 | 6.76 | -0.88 | 0.125 |
| 75.50 | -16.07 | -3.37 | 0.00 | -183.77 | 0.00 | 183.77 | 1,463.70 | 731.85 | 1,594.18 | 787.30 | 6.85 | -0.89 | 0.124 |
| 76.00 | -15.98 | -3.36 | 0.00 | -182.08 | 0.00 | 182.08 | 1,461.11 | 730.55 | 1,586.59 | 783.56 | 6.94 | -0.90 | 0.123 |
| 76.50 | -15.89 | -3.36 | 0.00 | -180.40 | 0.00 | 180.40 | 1,458.51 | 729.25 | 1,579.01 | 779.81 | 7.04 | -0.91 | 0.123 |
| 77.00 | -15.80 | -3.35 | 0.00 | -178.72 | 0.00 | 178.72 | 1,455.89 | 727.95 | 1,571.44 | 776.07 | 7.13 | -0.91 | 0.122 |
| 77.50 | -15.71 | -3.34 | 0.00 | -177.05 | 0.00 | 177.05 | 1,453.27 | 726.64 | 1,563.87 | 772.34 | 7.23 | -0.92 | 0.121 |
| 78.00 | -15.62 | -3.33 | 0.00 | -175.38 | 0.00 | 175.38 | 1,450.64 | 725.32 | 1,556.31 | 768.60 | 7.32 | -0.93 | 0.120 |
| 78.50 | -15.53 | -3.32 | 0.00 | -173.72 | 0.00 | 173.72 | 1,447.99 | 724.00 | 1,548.75 | 764.87 | 7.42 | -0.93 | 0.120 |
| 79.00 | -15.44 | -3.31 | 0.00 | -172.06 | 0.00 | 172.06 | 1,445.34 | 722.67 | 1,541.20 | 761.14 | 7.52 | -0.94 | 0.119 |
| 79.50 | -15.35 | -3.30 | 0.00 | -170.40 | 0.00 | 170.40 | 1,442.68 | 721.34 | 1,533.65 | 757.41 | 7.62 | -0.95 | 0.118 |

Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

Site Number: $302494 \quad$ Code: ANSI/TIA-222-G © $2007-2018$ by ATC IP LLC. All rights reserved.

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:37 PM
Customer: SPRINT NEXTEL

| Load Case: 1.0D + 1.0W |  |  |  | Serviceability 60 mph |  |  |  |  |  | 38 Iterations |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gust Response Factor : 1.10 <br> Dead Load Factor: 1.00 <br> Wind Load Factor : 1.00 |  |  |  |  |  |  |  |  |  | Wind Importance Factor: 1.00 |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 108.50 | -10.30 | -2.72 | 0.00 | -82.90 | 0.00 | 82.90 | 1,261.08 | 630.54 | 1,102.19 | 544.33 | 14.51 | -1.31 | 0.072 |
| 109.00 | -10.21 | -2.71 | 0.00 | -81.54 | 0.00 | 81.54 | 1,256.43 | 628.22 | 1,094.04 | 540.30 | 14.64 | $\begin{array}{r} -1.31 \end{array}$ | $0.071$ |
| 109.50 | -10.13 | -2.70 | 0.00 | -80.18 | 0.00 | 80.18 | 1,251.78 | 625.89 | 1,085.91 | 536.29 | 14.78 | -1.32 | 0.070 |
| 110.00 | -10.04 | -2.69 | 0.00 | -78.83 | 0.00 | 78.83 | 1,247.14 | 623.57 | 1,077.81 | 532.29 | 14.92 | -1.32 | 0.069 |
| 110.00 | -10.04 | -2.69 | 0.00 | -78.83 | 0.00 | 78.83 | 853.24 | 426.62 | 741.79 | 366.34 | 14.92 | -1.32 | 0.000 |
| 110.50 | -9.97 | -2.69 | 0.00 | -77.48 | 0.00 | 77.48 | 851.46 | 425.73 | 737.46 | 364.21 | 15.06 | -1.33 | 0.096 |
| 111.00 | -9.91 | -2.68 | 0.00 | -76.14 | 0.00 | 76.14 | 849.67 | 424.84 | 733.15 | 362.07 | 15.20 | -1.33 | 0.095 |
| 111.50 | -9.84 | -2.67 | 0.00 | -74.80 | 0.00 | 74.80 | 847.87 | 423.94 | 728.83 | 359.94 | 15.34 | -1.34 | 0.094 |
| 112.00 | -9.77 | -2.66 | 0.00 | -73.47 | 0.00 | 73.47 | 846.07 | 423.03 | 724.52 | 357.81 | 15.48 | -1.35 | 0.092 |
| 112.50 | -9.70 | -2.65 | 0.00 | -72.14 | 0.00 | 72.14 | 844.25 | 422.12 | 720.21 | 355.68 | 15.62 | -1.35 | 0.091 |
| 113.00 | -9.63 | -2.64 | 0.00 | -70.82 | 0.00 | 70.82 | 842.42 | 421.21 | 715.90 | 353.56 | 15.76 | -1.36 | 0.090 |
| 113.50 | -9.56 | -2.63 | 0.00 | -69.50 | 0.00 | 69.50 | 840.58 | 420.29 | 711.60 | 351.43 | 15.91 | -1.36 | 0.089 |
| 114.00 | -9.49 | -2.62 | 0.00 | -68.18 | 0.00 | 68.18 | 838.73 | 419.36 | 707.30 | 349.31 | 16.05 | -1.37 | 0.087 |
| 114.50 | -9.42 | -2.61 | 0.00 | -66.87 | 0.00 | 66.87 | 836.87 | 418.43 | 703.00 | 347.19 | 16.19 | -1.38 | 0.086 |
| 115.00 | -9.35 | -2.60 | 0.00 | -65.57 | 0.00 | 65.57 | 834.99 | 417.50 | 698.71 | 345.06 | 16.34 | -1.38 | 0.085 |
| 115.50 | -9.28 | -2.59 | 0.00 | -64.27 | 0.00 | 64.27 | 833.11 | 416.56 | 694.42 | 342.95 | 16.48 | -1.39 | 0.083 |
| 116.00 | -9.21 | -2.58 | 0.00 | -62.97 | 0.00 | 62.97 | 831.22 | 415.61 | 690.13 | 340.83 | 16.63 | -1.40 | 0.082 |
| 116.50 | -9.14 | -2.57 | 0.00 | -61.68 | 0.00 | 61.68 | 829.32 | 414.66 | 685.85 | 338.71 | 16.77 | -1.40 | 0.081 |
| 116.50 | -9.14 | -2.57 | 0.00 | -61.68 | 0.00 | 61.68 | 829.32 | 414.66 | 685.85 | 338.71 | 16.77 | -1.40 | 0.193 |
| 117.00 | -9.10 | -2.56 | 0.00 | -60.40 | 0.00 | 60.40 | 827.41 | 413.70 | 681.57 | 336.60 | 16.92 | -1.41 | 0.190 |
| 117.50 | -9.05 | -2.56 | 0.00 | -59.11 | 0.00 | 59.11 | 825.48 | 412.74 | 677.29 | 334.49 | 17.07 | -1.42 | 0.188 |
| 118.00 | -9.01 | -2.55 | 0.00 | -57.83 | 0.00 | 57.83 | 823.55 | 411.77 | 673.02 | 332.38 | 17.22 | -1.43 | 0.185 |
| 118.50 | -8.97 | -2.54 | 0.00 | -56.56 | 0.00 | 56.56 | 821.61 | 410.80 | 668.75 | 330.27 | 17.37 | -1.45 | 0.182 |
| 119.00 | -8.92 | -2.53 | 0.00 | -55.29 | 0.00 | 55.29 | 819.65 | 409.83 | 664.49 | 328.17 | 17.52 | -1.46 | 0.179 |
| 119.50 | -8.88 | -2.53 | 0.00 | -54.02 | 0.00 | 54.02 | 817.69 | 408.84 | 660.23 | 326.06 | 17.68 | -1.47 | 0.177 |
| 120.00 | -8.84 | -2.52 | 0.00 | -52.76 | 0.00 | 52.76 | 815.71 | 407.86 | 655.98 | 323.96 | 17.83 | -1.49 | 0.174 |
| 120.50 | -8.79 | -2.51 | 0.00 | -51.50 | 0.00 | 51.50 | 813.73 | 406.86 | 651.73 | 321.87 | 17.99 | -1.50 | 0.171 |
| 121.00 | -8.75 | -2.50 | 0.00 | -50.24 | 0.00 | 50.24 | 811.73 | 405.86 | 647.49 | 319.77 | 18.15 | -1.51 | 0.168 |
| 121.50 | -8.71 | -2.50 | 0.00 | -48.99 | 0.00 | 48.99 | 809.72 | 404.86 | 643.25 | 317.68 | 18.31 | -1.53 | 0.165 |
| 122.00 | -8.67 | -2.49 | 0.00 | -47.74 | 0.00 | 47.74 | 807.71 | 403.85 | 639.01 | 315.58 | 18.47 | -1.54 | 0.162 |
| 122.50 | -8.62 | -2.48 | 0.00 | -46.50 | 0.00 | 46.50 | 805.68 | 402.84 | 634.78 | 313.49 | 18.63 | -1.55 | 0.159 |
| 123.00 | -8.58 | -2.47 | 0.00 | -45.26 | 0.00 | 45.26 | 803.64 | 401.82 | 630.56 | 311.41 | 18.79 | -1.56 | 0.156 |
| 123.50 | -8.54 | -2.47 | 0.00 | -44.02 | 0.00 | 44.02 | 801.59 | 400.80 | 626.34 | 309.32 | 18.95 | -1.57 | 0.153 |
| 124.00 | -8.49 | -2.46 | 0.00 | -42.79 | 0.00 | 42.79 | 799.54 | 399.77 | 622.12 | 307.24 | 19.12 | -1.59 | 0.150 |
| 124.50 | -8.45 | -2.45 | 0.00 | -41.56 | 0.00 | 41.56 | 797.47 | 398.73 | 617.91 | 305.16 | 19.29 | -1.60 | 0.147 |
| 125.00 | -8.41 | -2.44 | 0.00 | -40.34 | 0.00 | 40.34 | 795.39 | 397.69 | 613.71 | 303.09 | 19.46 | -1.61 | 0.144 |
| 125.50 | -8.37 | -2.43 | 0.00 | -39.12 | 0.00 | 39.12 | 793.30 | 396.65 | 609.51 | 301.01 | 19.62 | -1.62 | 0.141 |
| 126.00 | -8.33 | -2.43 | 0.00 | -37.90 | 0.00 | 37.90 | 791.20 | 395.60 | 605.32 | 298.94 | 19.79 | -1.63 | 0.137 |
| 126.50 | -8.28 | -2.42 | 0.00 | -36.69 | 0.00 | 36.69 | 789.09 | 394.54 | 601.13 | 296.88 | 19.97 | -1.64 | 0.134 |
| 127.00 | -8.24 | -2.41 | 0.00 | -35.48 | 0.00 | 35.48 | 786.97 | 393.48 | 596.95 | 294.81 | 20.14 | -1.65 | 0.131 |
| 127.50 | -8.20 | -2.40 | 0.00 | -34.27 | 0.00 | 34.27 | 784.84 | 392.42 | 592.78 | 292.75 | 20.31 | -1.66 | 0.128 |
| $128.00$ | -8.16 | -2.40 | 0.00 | -33.07 | 0.00 | 33.07 | 782.69 | 391.35 | 588.61 | 290.69 | 20.49 | -1.67 | 0.124 |
| $128.50$ | -8.12 | -2.39 | 0.00 | -31.87 | 0.00 | 31.87 | 780.54 | 390.27 | 584.44 | 288.64 | 20.66 | -1.68 | 0.121 |
| 129.00 | -8.07 | -2.38 | 0.00 | -30.68 | 0.00 | 30.68 | 778.38 | 389.19 | 580.29 | 286.58 | 20.84 | -1.69 | 0.117 |
| 129.50 | -8.03 | -2.37 | 0.00 | -29.49 | 0.00 | 29.49 | 776.21 | 388.10 | 576.14 | 284.53 | 21.02 | -1.70 | 0.114 |
| 130.00 | -7.99 | -2.36 | 0.00 | -28.30 | 0.00 | 28.30 | 774.02 | 387.01 | 572.00 | 282.49 | 21.20 | -1.71 | 0.111 |
| 130.50 | -7.95 | -2.36 | 0.00 | -27.12 | 0.00 | 27.12 | 771.83 | 385.91 | 567.86 | 280.44 | 21.38 | -1.72 | 0.107 |
| 131.00 | -4.74 | -1.43 | 0.00 | -25.95 | 0.00 | 25.95 | 769.63 | 384.81 | 563.73 | 278.40 | 21.56 | -1.73 | 0.099 |
| 131.50 | -4.71 | -1.42 | 0.00 | -25.23 | 0.00 | 25.23 | 767.41 | 383.71 | 559.60 | 276.37 | 21.74 | -1.74 | 0.097 |
| 132.00 | -4.67 | -1.41 | 0.00 | -24.52 | 0.00 | 24.52 | 765.19 | 382.59 | 555.49 | 274.33 | 21.92 | -1.75 | 0.095 |
| 132.50 | -4.64 | -1.41 | 0.00 | -23.81 | 0.00 | 23.81 | 762.95 | 381.48 | 551.38 | 272.31 | 22.10 | -1.75 | 0.094 |
| 133.00 | -4.60 | -1.40 | 0.00 | -23.11 | 0.00 | 23.11 | 760.71 | 380.35 | 547.28 | 270.28 | 22.29 | -1.76 | 0.092 |
| 133.50 | -4.57 | -1.39 | 0.00 | -22.41 | 0.00 | 22.41 | 758.45 | 379.23 | 543.18 | 268.26 | 22.47 | -1.77 | 0.090 |
| 134.00 | -4.53 | -1.38 | 0.00 | -21.72 | 0.00 | 21.72 | 756.18 | 378.09 | 539.09 | 266.24 | 22.66 | -1.78 | 0.088 |
| 134.50 | -4.50 | -1.37 | 0.00 | -21.02 | 0.00 | 21.02 | 753.91 | 376.95 | 535.01 | 264.22 | 22.84 | -1.78 | 0.086 |
| 135.00 | -4.46 | -1.36 | 0.00 | -20.34 | 0.00 | 20.34 | 751.62 | 375.81 | 530.94 | 262.21 | 23.03 | -1.79 | 0.084 |
| 135.50 | -4.43 | -1.36 | 0.00 | -19.66 | 0.00 | 19.66 | 749.32 | 374.66 | 526.87 | 260.20 | 23.22 | -1.80 | 0.081 |


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| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:37 PM |
| Customer: | SPRINT NEXTEL |  |  |



| Site Number: | 302494 |  |  |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: ANSI/TIA-222-G | OAA712589_C3_05 |

## Equivalent Lateral Forces Method Analysis

(Based on ASCE7-10 Chapters 11, 12, 15)

| ${ }_{5}$ ): |  | 0.18 |
| :---: | :---: | :---: |
| Spectral Response Acceleration at 1.0 Second Period (S |  | 0.06 |
| Long-Period Transition Period ( $T \quad$ L): |  | 6 |
| Importance Factor ( $\mathrm{IE}_{\text {) }}$ ): |  | 1.00 |
| Site Coefficient F a: |  | 1.60 |
| Site Coeffiecient F ${ }^{\text {: }}$ |  | 2.40 |
| Response Modification Coefficient (R): |  | 1.50 |
| Design Spectral Response Acceleration at Short Period (S | ds ${ }_{\text {d }}$ : | 0.19 |
| Design Spectral Response Acceleration at 1.0 Second Period (S | $\mathrm{d} 1^{1}$ ): | 0.10 |
| Seismic Response Coefficient (C s ${ }_{\text {s }}$ ): |  | 0.03 |
| Upper Limit C s |  | 0.03 |
| Lower Limit C |  | 0.03 |
| Period based on Rayleigh Method (sec): |  | 2.95 |
| Redundancy Factor (p): |  | 1.30 |
| Seismic Force Distribution Exponent (k): |  | 2.00 |
| Total Unfactored Dead Load: |  | 35.07 |
| Seismic Base Shear (E): |  | 1.37 |


| Load Case 1.2 | LFM | Seismic Equivalent Lateral Forces Method |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Segment | Height <br> Above Base <br> (ft) | Weight <br> (lb) | $\begin{gathered} W_{z} \\ (\mathrm{lb}-\mathrm{ft}) \end{gathered}$ | $\mathrm{C}_{\mathrm{vx}}$ | Horizontal Force <br> (lb) | Vertical Force |
| 303 | 149.75 | 30 | 669 | 0.002 | 3 | 37 |
| 302 | 149.25 | 30 | 666 | 0.002 | 3 | 37 |
| 301 | 148.75 | 30 | 663 | 0.002 | 3 | 37 |
| 300 | 148.25 | 30 | 661 | 0.002 | 3 | 37 |
| 299 | 147.75 | 30 | 658 | 0.002 | 3 | 37 |
| 298 | 147.25 | 30 | 655 | 0.002 | 3 | 37 |
| 297 | 146.75 | 30 | 652 | 0.002 | 3 | 37 |
| 296 | 146.25 | 30 | 650 | 0.002 | 3 | 38 |
| 295 | 145.75 | 30 | 647 | 0.002 | 3 | 38 |
| 294 | 145.25 | 31 | 644 | 0.002 | 3 | 38 |
| 293 | 144.75 | 31 | 642 | 0.002 | 3 | 38 |
| 292 | 144.25 | 31 | 639 | 0.002 | 3 | 38 |
| 291 | 143.75 | 31 | 636 | 0.002 | 3 | 38 |
| 290 | 143.25 | 31 | 633 | 0.002 | 3 | 38 |
| $289$ | $142.75$ | 31 | 631 | $0.002$ | 3 | 38 |
| $288$ | 142.25 | 31 | 628 | $0.002$ | 3 | 38 |
| 287 | 141.75 | 31 | 625 | 0.002 | 3 | 38 |
| $\begin{aligned} & 286 \\ & 285 \end{aligned}$ | 141.25 14075 | 31 | 622 | 0.002 | 3 | 39 |
| 285 284 | 140.75 140.25 | 34 34 | 668 665 | 0.002 0.002 | 3 3 3 | 42 |
| 283 | 139.75 | 34 | 662 | 0.002 | 3 | 42 |
| 282 | 139.25 | 34 | 659 | 0.002 | , | 42 |
| 281 | 138.75 | 34 | 655 | 0.002 | 3 | 42 |

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| :--- | :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589 C3 05 | $4 / 24 / 20185: 54.38$ PM |

Customer: SPRINT NEXTEL

| 216 | 106.25 | 84 | 952 | 0.003 | 5 | 104 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 215 | 105.75 | 84 | 944 | 0.003 | 5 | 105 |
| 214 | 105.25 | 85 | 937 | 0.003 | 5 | 105 |
| 213 | 104.75 | 85 | 929 | 0.003 | 5 | 105 |
| 212 | 104.25 | 85 | 921 | 0.003 | 5 | 105 |
| 211 | 103.75 | 85 | 914 | 0.003 | 5 | 105 |
| 210 | 103.25 | 85 | 906 | 0.003 | 5 | 105 |
| 209 | 102.75 | 85 | 898 | 0.003 | 4 | 105 |
| 208 | 102.25 | 85 | 891 | 0.003 | 4 | 105 |
| 207 | 101.75 | 85 | 883 | 0.003 | 4 | 106 |
| 206 | 101.25 | 85 | 876 | 0.003 | 4 | 106 |
| 205 | 100.75 | 86 | 868 | 0.003 | 4 | 106 |
| 204 | 100.25 | 86 | 861 | 0.003 | 4 | 106 |
| 203 | 99.75 | 86 | 853 | 0.003 | 4 | 106 |
| 202 | 99.25 | 86 | 846 | 0.003 | 4 | 106 |
| 201 | 98.75 | 86 | 838 | 0.003 | 4 | 106 |
| 200 | 98.25 | 86 | 831 | 0.003 | 4 | 107 |
| 199 | 97.75 | 86 | 823 | 0.003 | 4 | 107 |
| 198 | 97.25 | 86 | 816 | 0.003 | 4 | 107 |
| 197 | 96.75 | 86 | 809 | 0.003 | 4 | 107 |
| 196 | 96.25 | 86 | 801 | 0.003 | 4 | 107 |
| 195 | 95.75 | 87 | 794 | 0.003 | 4 | 107 |
| 194 | 95.25 | 87 | 787 | 0.003 | 4 | 107 |
| 193 | 94.75 | 87 | 779 | 0.003 | 4 | 107 |
| 192 | 94.25 | 87 | 772 | 0.003 | 4 | 108 |
| 191 | 93.75 | 87 | 765 | 0.003 | 4 | 108 |
| 190 | 93.25 | 87 | 758 | 0.003 | 4 | 108 |
| 189 | 92.75 | 87 | 750 | 0.003 | 4 | 108 |
| 188 | 92.25 | 87 | 743 | 0.003 | 4 | 108 |
| 187 | 91.75 | 87 | 736 | 0.003 | 4 | 108 |
| 186 | 91.25 | 88 | 729 | 0.003 | 4 | 108 |
| 185 | 90.75 | 88 | 722 | 0.003 | 4 | 108 |
| 184 | 90.25 | 88 | 715 | 0.003 | 4 | 109 |
| 183 | 89.75 | 88 | 708 | 0.003 | 4 | 109 |
| 182 | 89.25 88.75 | 88 88 | 701 | 0.003 | 3 | 109 |
| 181 180 | 88.75 88.25 | 88 88 | 694 687 | 0.003 0.002 | 3 3 | 109 109 |
| 179 | 87.75 | 88 | 680 | 0.002 | 3 | 109 |
| 178 | 87.25 | 88 | 673 | 0.002 | 3 | 109 |
| 177 | 86.75 | 89 | 666 | 0.002 | 3 | 110 |
| 176 | 86.25 | 89 | 659 | 0.002 | 3 | 110 |
| 175 | 85.75 | 89 | 653 | 0.002 | 3 | 110 |
| 174 173 | 85.25 | 89 | 646 | 0.002 | 3 | 110 |
| 172 | 84.25 | 89 | 639 | 0.002 0.002 | 3 | 110 110 |
| 171 | 83.75 | 89 | 625 | 0.002 | 3 | 110 |
| 170 | 83.25 | 89 | 619 | 0.002 | 3 | 110 |
| 169 | 82.75 | 89 | 612 | 0.002 | 3 | 111 |
| 168 | 82.25 | 89 | 605 | 0.002 | 3 | 111 |
| 167 | 81.75 | 90 | 599 | 0.002 | 3 | 111 |
| 166 | 81.25 | 90 | 592 | 0.002 | 3 | 111 |
| 165 | 80.75 | 90 | 586 | 0.002 | 3 | 111 |
| 164 | 80.25 | 90 | 579 | 0.002 | 3 | 111 |
| 163 | 79.75 | 90 | 573 | 0.002 | 3 | 111 |
| 162 | 79.25 | 90 | 566 | 0.002 | 3 | 112 |
| 161 | 78.75 | 90 | 560 | 0.002 | 3 | 112 |
| 160 | 78.25 77.75 | 90 | 553 | 0.002 | 3 | 112 |
| 159 158 | 77.75 77.25 | 90 91 | 547 | 0.002 0.002 | 3 | 112 |
| 157 | 76.75 | 91 | 534 | 0.002 | 3 | 112 |
| 156 | 76.25 | 91 | 528 | 0.002 | 3 | 112 |
| 155 | 75.75 | 91 | 522 | 0.002 | 3 | 112 |
| 154 | 75.25 | 91 | 515 | 0.002 | 3 | 113 |
| 153 | 74.75 | 91 | 509 | 0.002 | 3 | 113 |

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| :--- | :--- | :--- | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: ANSI/TIA-222-G | C2AT12589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |  |


| 152 | 74.25 | 91 | 503 | 0.002 | 3 | 113 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 151 | 73.75 | 91 | 497 | 0.002 | 2 | 113 |
| 150 | 73.41 | 46 | 250 | 0.001 | 1 | + 5 |
| 149 | 73.17 | 94 | 504 | 0.002 | 3 | 117 |
| 148 | 72.75 | 143 | 756 | 0.003 | 4 | 177 |
| 147 | 72.25 | 143 | 747 | 0.003 | 4 | 177 |
| 146 | 71.75 | 143 | 738 | 0.003 | 4 | 177 |
| 145 | 71.25 | 144 | 729 | 0.003 | 4 | 178 |
| 144 | 70.75 | 144 | 720 | 0.003 | 4 | 178 |
| 143 | 70.25 | 144 | 711 | 0.003 | 4 | 178 |
| 142 | 69.75 | 107 | 520 | 0.002 | 3 | 132 |
| 141 | 69.25 | 107 | 513 | 0.002 | 3 | 132 |
| 140 | 68.75 | 107 | 506 | 0.002 | 3 | 133 |
| 139 | 68.25 | 107 | 500 | 0.002 | 2 | 133 |
| 138 | 67.75 | 107 | 493 | 0.002 | 2 | 133 |
| 137 | 67.25 | 108 | 486 | 0.002 | 2 | 133 |
| 136 | 66.75 | 108 | 480 | 0.002 | 2 | 133 |
| 135 | 66.25 | 108 | 473 | 0.002 | 2 | 133 |
| 134 133 | 65.75 | 108 | 467 | 0.002 | 2 | 134 |
| 132 | 65.25 | 108 | 460 | 0.002 | 2 | 134 |
| 131 | 64.25 | 108 | 454 | 0.002 | 2 | 134 134 |
| 130 | 63.75 | 108 | 441 | 0.002 | 2 | 134 |
| 129 | 63.25 | 109 | 435 | 0.002 | 2 | 134 |
| 128 | 62.75 | 109 | 428 | 0.002 | 2 | 135 |
| 127 | 62.25 | 109 | 422 | 0.002 | 2 | 135 |
| 126 | 61.75 | 109 | 416 | 0.002 | 2 | 135 |
| 125 | 61.25 | 109 | 409 | 0.001 | 2 | 135 |
| 124 | 60.75 | 109 | 403 | 0.001 | 2 | 135 |
| 123 122 | 60.25 59.75 | 109 | 397 | 0.001 | 2 | 135 |
| 121 | 59.75 59.25 | 110 | 391 | 0.001 | 2 | 136 |
| 120 | 58.75 | 110 | 379 | 0.001 | 2 | 136 |
| 119 | 58.25 | 110 | 373 | 0.001 | 2 | 136 |
| 118 | 57.75 | 110 | 367 | 0.001 | 2 | 136 |
| 117 | 57.25 | 110 | 361 | 0.001 | 2 | 136 |
| 116 | 56.75 | 110 | 355 | 0.001 | 2 | 137 |
| 115 | 56.25 | 110 | 350 | 0.001 | 2 | 137 |
| 114 | 55.75 | 111 | 344 | 0.001 | 2 | 137 |
| 113 | 55.25 | 111 | 338 | 0.001 | 2 | 137 |
| 112 | 54.75 | 111 | 332 | 0.001 | 2 | 137 |
| 111 | 54.25 | 111 | 327 | 0.001 | 2 | 137 |
| 110 109 | 53.75 53.25 | 111 | 321 | 0.001 | 2 | 138 |
| 108 | 52.75 | 111 | 316 310 | 0.001 | 2 | 138 138 |
| 107 | 52.25 | 112 | 305 | 0.001 | 2 | 138 |
| 106 | 51.75 | 112 | 299 | 0.001 | 1 | 138 |
| 105 | 51.25 | 112 | 294 | 0.001 | 1 | 138 |
| 104 | 50.75 | 112 | 288 | 0.001 | 1 | 139 |
| 103 | 50.25 | 112 | 283 | 0.001 | 1 | 139 |
| 102 | 49.75 | 112 | 278 | 0.001 | 1 | 139 |
| 101 | 49.25 | 112 | 273 | 0.001 | 1 | 139 |
| 100 | 48.75 | 113 | 267 | 0.001 | 1 | 139 |
| 99 | 48.25 | 113 | 262 | 0.001 | 1 | 139 |
| 98 | 47.75 | 113 | 257 | 0.001 | 1 | 140 |
| 97 | 47.25 | 113 | 252 | 0.001 | 1 | 140 |
| 96 | 46.75 | 113 | 247 | 0.001 | 1 | 140 |
| 95 | 46.25 | 113 | 242 | 0.001 | 1 | 140 |
| 94 | 45.75 | 113 | 237 | 0.001 | 1 | 140 |
| 93 | 45.25 | 113 | 232 | 0.001 | 1 | 140 |
| 92 | 44.75 | 114 | 227 | 0.001 | 1 | 141 |
| 91 | 44.25 | 114 | 223 | 0.001 | 1 | 141 |
| 90 | 43.75 | 114 | 218 | 0.001 | 1 | 141 |
| 89 | 43.25 | 114 | 213 | 0.001 | 1 | 141 |


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| Customer: | SPRINT NEXTEL |  |  |  |


| 88 | 42.75 | 114 | 209 | 0.001 | 1 | 141 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 87 | 42.25 | 114 | 204 | 0.001 | 1 | 141 |
| 86 | 41.75 | 114 | 199 | 0.001 | 1 | 142 |
| 85 | 41.25 | 115 | 195 | 0.001 | 1 | 142 |
| 84 | 40.75 | 115 | 190 | 0.001 | 1 | 142 |
| 83 | 40.25 | 115 | 186 | 0.001 | 1 | 142 |
| 82 | 39.75 | 115 | 182 | 0.001 | 1 | 142 |
| 81 | 39.25 | 115 | 177 | 0.001 | 1 | 142 |
| 80 | 38.75 | 115 | 173 | 0.001 | 1 | 143 |
| 79 | 38.25 | 115 | 169 | 0.001 | 1 | 143 |
| 78 | 37.75 | 115 | 165 | 0.001 | 1 | 143 |
| 77 | 37.25 | 116 | 160 | 0.001 | 1 | 143 |
| 76 | 36.83 | 76 | 104 | 0.000 | 1 | 95 |
| 75 | 36.58 | 42 | 56 | 0.000 | 0 | 51 |
| 74 | 36.25 | 122 | 161 | 0.001 | 1 | 151 |
| 73 | 35.83 | 82 | 105 | 0.000 | 1 | 101 |
| 72 | 35.58 | 62 | 79 | 0.000 | 0 | 77 |
| 71 | 35.25 | 187 | 233 | 0.001 | 1 | 232 |
| 70 | 34.75 | 187 | 226 | 0.001 | 1 | 232 |
| 69 | 34.25 | 188 | 220 | 0.001 | 1 | 232 |
| 68 | 33.75 | 188 | 214 | 0.001 | 1 | 233 |
| 67 | 33.25 | 188 | 208 | 0.001 | 1 | 233 |
| 66 | 32.75 | 189 | 202 | 0.001 | 1 | 233 |
| 65 | 32.25 | 189 | 197 | 0.001 | 1 | 234 |
| 64 | 31.75 | 189 | 191 | 0.001 | 1 | 234 |
| 63 | 31.25 | 133 | 130 | 0.000 | 1 | 165 |
| 62 | 30.75 | 134 | 126 | 0.000 | 1 | 165 |
| 61 | 30.25 | 134 | 122 | 0.000 | 1 | 165 |
| 60 | 29.75 | 134 | 118 | 0.000 | 1 | 166 |
| 59 | 29.25 | 134 | 115 | 0.000 | 1 | 166 |
| 58 | 28.75 | 134 | 111 | 0.000 | 1 | 166 |
| 57 | 28.25 | 134 | 107 | 0.000 | 1 | 166 |
| 56 | 27.75 | 135 | 104 | 0.000 | 1 | 166 |
| 55 | 27.25 | 135 | 100 | 0.000 | 0 | 167 |
| 54 | 26.75 | 135 | 96 | 0.000 | 0 | 167 |
| 53 | $26.25$ | 135 | 93 | 0.000 | 0 | 167 |
| 52 | 25.75 | 135 | 90 | 0.000 | 0 | 167 |
| 51 | 25.25 | 135 | 86 | 0.000 |  | 167 |
| 50 | 24.75 | 135 | 83 | 0.000 | 0 | 168 |
| 49 | 24.25 | 136 | 80 | 0.000 | 0 | 168 |
| 48 | 23.75 | 136 | 77 | 0.000 | 0 | 168 |
| 47 | 23.25 | 136 | 73 | 0.000 | 0 | 168 |
| 46 45 | 22.75 | 136 | 70 | 0.000 | 0 | 168 |
| 44 | 22.25 21.75 | 136 136 | 67 | 0.000 0.000 | 0 | 169 |
| 43 | 21.25 | 137 | 62 | 0.000 | 0 | 169 |
| 42 | 20.75 | 137 | 59 | $0.000$ | 0 | 169 |
| 41 | 20.25 | 137 | 56 | $0.000$ | 0 | 169 |
| 40 | 19.75 | 137 | 53 | 0.000 | 0 | 170 |
| 39 | 19.25 | 137 | 51 | 0.000 | 0 | 170 |
| 38 | 18.75 | 137 | 48 | 0.000 | 0 | 170 |
| 37 | 18.25 | 138 | 46 | 0.000 | 0 | 170 |
| 36 | 17.75 | 138 | 43 | 0.000 | 0 | 170 |
| 35 | 17.25 | 138 | 41 | 0.000 | 0 | 171 |
| 34 | 16.75 | 138 | 39 | 0.000 | 0 | 171 |
| 33 | 16.25 | 138 | 36 | 0.000 | 0 | 171 |
| 32 | 15.75 | 138 | 34 | $0.000$ | 0 | 171 |
| 31 | 15.25 | 139 | 32 | 0.000 | 0 | 171 |
| 30 | 14.75 | 139 | 30 | 0.000 | 0 | 172 |
| 29 | 14.25 | 139 | 28 | 0.000 | 0 | 172 |
| 28 | 13.75 | 139 | 26 | 0.000 | 0 | 172 |
| 27 | 13.25 | 139 | 24 | 0.000 | 0 | 172 |
| 26 | 12.75 | 139 | 23 | 0.000 | 0 | 172 |
| 25 | 12.25 | 140 | 21 | 0.000 | 0 | 173 |


| Site Number: | 302494 |  | Code: ANSI/TIA-222-G | ©2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 20185: 54: 38$ PM |
| Customer: | SPRINT NEXTEL |  |  |  |


| 24 | 11.75 | 140 | 19 | 0.000 | 0 | 173 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 23 | 11.25 | 140 | 18 | 0.000 | 0 | 173 |
| 22 | 10.75 | 140 | 16 | 0.000 | 0 | 173 |
| 21 | 10.25 | 140 | 15 | 0.000 | 0 | 173 |
| 20 | 9.75 | 140 | 13 | 0.000 | 0 | 174 |
| 19 | 9.25 | 140 | 12 | 0.000 | 0 | 174 |
| 18 | 8.75 | 141 | 11 | 0.000 | 0 | 174 |
| 17 | 8.25 | 141 | 10 | 0.000 | 0 | 174 |
| 16 | 7.75 | 118 | 7 | 0.000 | 0 | 146 |
| 15 | 7.25 | 118 | 6 | 0.000 | 0 | 146 |
| 14 | 6.75 | 118 | 5 | 0.000 | 0 | 147 |
| 13 | 6.25 | 119 | 5 | 0.000 | 0 | 147 |
| 12 | 5.75 | 119 | 4 | 0.000 | 0 | 147 |
| 11 | 5.25 | 119 | 3 | 0.000 | 0 | 147 |
| 10 | 4.75 | 119 | 3 | 0.000 | 0 | 147 |
| 9 | 4.25 | 119 | 2 | 0.000 | 0 | 148 |
| 8 | 3.75 | 119 | 2 | 0.000 | 0 | 148 |
| 7 | 3.25 | 120 | 1 | 0.000 | 0 | 148 |
| 6 | 2.75 | 120 | 1 | 0.000 | 0 | 148 |
| 5 | 2.25 | 120 | 1 | 0.000 | 0 | 148 |
| 4 | 1.75 | 120 | 0 | 0.000 | 0 | 149 |
| 3 | 1.25 | 120 | 0 | 0.000 | 0 | 149 |
| 2 | 0.75 | 120 | 0 | 0.000 | 0 | 149 |
| 1 | 0.25 | 121 | 0 | 0.000 | 0 | 149 |
| Kaelus DBC0061F1V51- | 150.00 | 153 | 3,443 | 0.013 | 17 | 189 |
| Decibel DB910CE-M | 150.00 | 16 | 360 | 0.001 | 2 | 20 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 715 | 0.003 | 2 | 39 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 715 | 0.003 | 4 | 39 |
| Powerwave LGP17201 | 150.00 | 186 | 4,185 | 0.015 | 21 | 230 |
| Ericsson RRUS 11 (Ba | 150.00 | 165 | 3,713 | 0.014 | 18 | 204 |
| Ericsson RRUS 32 (50 | 150.00 | 152 | 3,429 | 0.012 | 17 | 189 |
| Ericsson RRUS $32 \mathrm{B2}$ | 150.00 | 159 | 3,577 | 0.013 | 18 | 197 |
| Powerwave Allgon 777 | 150.00 | 105 | 2,363 | 0.009 | 12 | 130 |
| KMW AM-X-CD-16-65-00 Quintel QS66512-2 | 150.00 150.00 | 97 333 | 2,183 7,493 | 0.008 0.027 | 11 37 | 120 412 |
| Powerwave P65-17-XLH | 150.00 | 50 | 7,493 | 0.027 | 11 6 | 412 62 |
| Round Platform w/ Ha | 150.00 | 2,000 | 45,000 | 0.164 | 224 | 2,475 |
| RFS APXV18-206517LS- | 141.00 | 66 | 1,312 | 0.005 | 7 | 82 |
| Alcatel-Lucent RRH2x | 131.00 | 317 | 5,447 | 0.020 | 27 | 393 |
| Alcatel-Lucent 1900 | 131.00 | 180 | 3,089 | 0.011 | 15 | 223 |
| Decibel DB844H90E-XY | 131.00 | 84 | 1,442 | 0.005 | 7 | 104 |
| Alcatel-Lucent TD-RR | 131.00 | 210 | 3,604 | 0.013 | 18 | 260 |
| RFS APXVTM14-ALU-I20 Commscope NNVV-65B-R | $\begin{aligned} & 131.00 \\ & 131.00 \end{aligned}$ | 169 232 | 2,893 3,985 | 0.011 0.014 | 14 20 | 209 287 |
| Round Platform w/ Ha | 131.00 | 2,000 | 34,322 | 0.125 | 171 | 2,475 |
|  |  | 35,073 | 274,918 | 1.000 | 1,368 | 43,405 |

Load Case (0.9-0.2Sds) * DL + E ELFM
Seismic (Reduced DL) Equivalent Lateral Forces Method

Height
Above
Height
Above
Base

| Segment | (ft) |
| :--- | :---: |
| 303 | 149.75 |
| 302 | 149.25 |
| 301 | 148.75 |
| 300 | 148.25 |
| 299 | 147.75 |
| 298 | 147.25 |
| 297 | 146.75 |
| 296 | 146.25 |
| 295 | 145.75 |


| Weight <br> (lb) | $W_{z}$ <br> $(\mathrm{lb}-\mathrm{ft})$ | $\mathrm{C}_{\mathrm{vx}}$ | Horizontal <br> Force <br> (lb) | Vertical <br> Force |
| :---: | :---: | :---: | :---: | :---: |
| 30 | 669 | 0.002 | 3 | $(\mathrm{lb})$ |
| 30 | 666 | 0.002 | 3 | 26 |
| 30 | 663 | 0.02 | 3 | 26 |
| 30 | 661 | 0.002 | 3 | 26 |
| 30 | 658 | 0.002 | 3 | 26 |
| 30 | 655 | 0.002 | 3 | 26 |
| 30 | 652 | 0.002 | 3 | 26 |
| 30 | 650 | 0.002 | 3 | 26 |
| 30 | 647 | 0.002 | 3 | 26 |
|  |  |  |  | 26 |


| Site Number: | 302494 |  | Code: ANSI/TIA-222-G |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 |  |
| Customer: | SPRINT NEXTEL |  |  |


|  |  |  |  |  |  |
| :--- | :--- | :--- | :--- | :--- | :--- |
| 294 |  |  |  |  |  |


| Site Number: | 302494 |  | Code: ANSI/TIA-222-G | c2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :---: | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:38 PM |
| Customer: | SPRINT NEXTEL |  |  |  |


| 230 | 113.25 | 69 | 891 | 0.003 | 4 | 60 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 229 | 112.75 | 70 | 884 | 0.003 | 4 | 60 |
| 228 | 112.25 | 70 | 877 | 0.003 | 4 | 60 |
| 227 | 111.75 | 70 | 870 | 0.003 | 4 | 60 |
| 226 | 111.25 | 70 | 863 | 0.003 | 4 | 60 |
| 225 | 110.75 | 70 | 857 | 0.003 | 4 | 60 |
| 224 | 110.25 | 70 | 850 | 0.003 |  | 60 |
| 223 | 109.75 | 84 | 1,007 | 0.004 | 5 | 72 |
| 222 | 109.25 | 84 | 999 | 0.004 | 5 | 72 |
| 221 | 108.75 | 84 | 991 | 0.004 | 5 | 72 |
| 220 | 108.25 | 84 | 983 | 0.004 | 5 | 72 |
| 219 | 107.75 | 84 | 975 | 0.004 | 5 | 72 |
| 218 | 107.25 | 84 | 968 | 0.004 | 5 | 73 |
| 217 | 106.75 | 84 | 960 | 0.003 | 5 | 73 |
| 216 | 106.25 | 84 | 952 | 0.003 | 5 | 73 |
| 215 | 105.75 | 84 | 944 | 0.003 | 5 | 73 |
| 214 | 105.25 | 85 | 937 | 0.003 | 5 | 73 |
| 213 | 104.75 | 85 | 929 | 0.003 | 5 | 73 |
| 212 | 104.25 | 85 | 921 | 0.003 | 5 | 73 |
| 211 | 103.75 | 85 | 914 | 0.003 | 5 | 73 |
| 210 | 103.25 | 85 | 906 | 0.003 | 5 | 73 |
| 209 | 102.75 | 85 | 898 | 0.003 | 4 | 73 |
| 208 | 102.25 | 85 | 891 | 0.003 | 4 | 73 |
| 207 | 101.75 | 85 | 883 | 0.003 | 4 | 74 |
| 206 | 101.25 | 85 | 876 | 0.003 | 4 | 74 |
| 205 | 100.75 | 86 | 868 | 0.003 | 4 | 74 |
| 204 | 100.25 | 86 | 861 | 0.003 | 4 | 74 |
| 203 | 99.75 | 86 | 853 | 0.003 | 4 | 74 |
| 202 | 99.25 | 86 | 846 | 0.003 | 4 | 74 |
| 201 | 98.75 | 86 | 838 | 0.003 | 4 | 74 |
| 200 | 98.25 | 86 | 831 | 0.003 | 4 | 74 |
| 199 | 97.75 | 86 | 823 | 0.003 | 4 | 74 |
| 198 | 97.25 | 86 | 816 | 0.003 | 4 | 74 |
| 197 | 96.75 | 86 | 809 | 0.003 | 4 | 74 |
| 196 | 96.25 | 86 | 801 | 0.003 | 4 | 75 |
| 195 | 95.75 | 87 | 794 | 0.003 | 4 | 75 |
| 194 | 95.25 | 87 | 787 | 0.003 | 4 | 75 |
| 193 | 94.75 | 87 | 779 | 0.003 | 4 | 75 |
| 192 | 94.25 | 87 | 772 | 0.003 | 4 | 75 |
| 191 | 93.75 | 87 | 765 | 0.003 | 4 | 75 |
| 190 | 93.25 | 87 | 758 | 0.003 | 4 | 75 |
| 189 | 92.75 | 87 | 750 | 0.003 | 4 | 75 |
| $188$ | $92.25$ | $\begin{aligned} & 87 \\ & 87 \end{aligned}$ | 743 | $0.003$ | 4 | 75 |
| 187 | $\begin{aligned} & 91.75 \\ & 91.25 \end{aligned}$ | 87 88 | 736 729 | 0.003 0.003 | 4 4 | 75 76 |
| 185 | 90.75 | 88 | 722 | 0.003 | 4 | 76 |
| 184 | 90.25 | 88 | 715 | 0.003 | 4 | 76 |
| 183 | 89.75 | 88 | 708 | 0.003 | 4 | 76 |
| 182 | 89.25 | 88 | 701 | 0.003 | 3 | 76 |
| 181 | 88.75 | 88 | 694 | 0.003 | 3 | 76 |
| 180 | 88.25 | 88 | 687 | 0.002 |  | 76 |
| 179 | 87.75 | 88 | 680 | 0.002 |  | 76 |
| 178 | 87.25 | 88 | 673 | 0.002 | 3 | 76 |
| 177 | 86.75 | 89 | 666 | 0.002 | 3 | 76 |
| 176 | 86.25 | 89 | 659 | 0.002 | 3 | 76 |
| 175 | 85.75 | 89 | 653 | 0.002 | 3 | 77 |
| 174 | 85.25 | 89 | 646 | 0.002 | 3 | 77 |
| 173 | 84.75 | 89 | 639 | 0.002 | 3 | 77 |
| 172 | 84.25 | 89 | 632 | 0.002 | 3 | 77 |
| 171 | 83.75 | 89 | 625 | 0.002 | 3 | 77 |
| 170 | 83.25 | 89 | 619 | 0.002 | 3 | 77 |
| 169 | 82.75 | 89 | 612 | 0.002 | 3 | 77 |
| 168 | 82.25 | 89 | 605 | 0.002 | 3 | 77 |
| 167 | 81.75 | 90 | 599 | 0.002 | 3 | 77 |


| Site Number: | 302494 | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:38 PM |

Customer: SPRINT NEXTEL

| 166 | 81.25 | 90 | 592 | 0.002 | 3 | 77 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 165 | 80.75 | 90 | 586 | 0.002 | 3 | 77 |
| 164 | 80.25 | 90 | 579 | 0.002 | 3 | 78 |
| 163 | 79.75 | 90 | 573 | 0.002 | 3 | 78 |
| 162 | 79.25 | 90 | 566 | 0.002 | 3 | 78 |
| 161 | 78.75 | 90 | 560 | 0.002 | 3 | 78 |
| 160 | 78.25 | 90 | 553 | 0.002 | 3 | 78 |
| 159 | 77.75 | 90 | 547 | 0.002 | 3 | 78 |
| 158 | 77.25 | 91 | 540 | 0.002 | 3 | 78 |
| 157 | 76.75 | 91 | 534 | 0.002 | 3 | 78 |
| 156 | 76.25 | 91 | 528 | 0.002 | 3 | 78 |
| 155 | 75.75 | 91 | 522 | 0.002 | 3 | 78 |
| 154 | 75.25 | 91 | 515 | 0.002 | 3 | 78 |
| 153 | 74.75 | 91 | 509 | 0.002 | 3 | 79 |
| 152 | 74.25 | 91 | 503 | 0.002 | 3 | 79 |
| 151 | 73.75 | 91 | 497 | 0.002 | 2 | 79 |
| 150 | 73.41 | 46 | 250 | 0.001 | 1 | 40 |
| 149 | 73.17 | 94 | 504 | 0.002 | 3 | 81 |
| 148 | 72.75 | 143 | 756 | 0.003 | 4 | 123 |
| 147 | 72.25 | 143 | 747 | 0.003 | 4 | 123 |
| 146 | 71.75 | 143 | 738 | 0.003 | 4 | 124 |
| 145 | 71.25 | 144 | 729 | 0.003 | 4 | 124 |
| 144 | 70.75 | 144 | 720 | 0.003 | 4 | 124 |
| 143 | 70.25 | 144 | 711 | 0.003 | 4 | 124 |
| 142 | 69.75 | 107 | 520 | 0.002 | 3 | 92 |
| 141 | 69.25 | 107 | 513 | 0.002 | 3 | 92 |
| 140 | 68.75 | 107 | 506 | 0.002 | 3 | 92 |
| 139 | 68.25 | 107 | 500 | 0.002 | 2 | 93 |
| 138 | 67.75 | 107 | 493 | 0.002 | 2 | 93 |
| 137 | 67.25 | 108 | 486 | 0.002 | 2 | 93 |
| 136 | 66.75 | 108 | 480 | 0.002 | 2 | 93 |
| 135 | 66.25 | 108 | 473 | 0.002 | 2 | 93 |
| 134 | 65.75 | 108 | 467 | 0.002 | 2 | 93 |
| 133 | 65.25 | 108 | 460 | 0.002 | 2 | 93 |
| 132 | 64.75 | 108 | 454 | 0.002 | 2 | 93 |
| 131 | 64.25 | 108 | 447 | 0.002 | 2 | 93 |
| 130 | 63.75 | 108 | 441 | 0.002 | 2 | 94 |
| 129 | 63.25 | 109 | 435 | 0.002 | 2 | 94 |
| 128 | 62.75 | 109 | 428 | 0.002 | 2 | 94 |
| 127 | 62.25 | 109 | 422 | 0.002 | 2 | 94 |
| 126 | 61.75 | 109 | 416 | 0.002 | 2 | 94 |
| 125 | 61.25 | 109 | 409 | 0.001 | 2 | 94 |
| 124 | 60.75 | 109 | 403 | 0.001 | 2 | 94 |
| 123 | 60.25 | 109 | 397 | 0.001 | 2 | 94 |
| 122 | 59.75 | 110 | 391 | 0.001 | 2 | 94 |
| 121 | 59.25 | 110 | 385 | 0.001 | 2 | 95 |
| 120 | 58.75 | 110 | 379 | 0.001 | 2 | 95 |
| 119 | 58.25 | 110 | 373 | 0.001 | 2 | 95 |
| 118 | 57.75 | 110 | 367 | 0.001 | 2 | 95 |
| 117 | 57.25 | 110 | 361 | 0.001 | 2 | 95 |
| 116 | 56.75 | 110 | 355 | 0.001 | 2 | 95 |
| 115 | 56.25 | 110 | 350 | 0.001 | 2 | 95 |
| 114 | 55.75 | 111 | 344 | 0.001 | 2 | 95 |
| 113 | 55.25 | 111 | 338 | 0.001 | 2 | 96 |
| 112 | 54.75 | 111 | 332 | 0.001 | 2 | 96 |
| 111 | 54.25 | 111 | 327 | 0.001 | 2 | 96 |
| 110 | 53.75 | 111 | 321 | 0.001 | 2 | 96 |
| 109 | 53.25 | 111 | 316 | 0.001 | 2 | 96 |
| 108 | 52.75 | 111 | 310 | 0.001 | 2 | 96 |
| 107 | 52.25 | 112 | 305 | 0.001 | 2 | 96 |
| 106 | 51.75 | 112 | 299 | 0.001 | 1 | 96 |
| 105 | 51.25 | 112 | 294 | 0.001 | 1 | 96 |
| 104 | 50.75 | 112 | 288 | 0.001 | 1 | 97 |
| 103 | 50.25 | 112 | 283 | 0.001 | 1 | 97 |


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| :--- | :--- | :--- | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 2018$ |
| Customer: | SPRINT NEXTEL |  |  |  |


| 102 | 49.75 | 112 | 278 | 0.001 | 1 | 97 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 101 | 49.25 | 112 | 273 | 0.001 | 1 | 97 |
| 100 | 48.75 | 113 | 267 | 0.001 | 1 | 97 |
| 99 | 48.25 | 113 | 262 | 0.001 | 1 | 97 |
| 98 | 47.75 | 113 | 257 | 0.001 | 1 | 97 |
| 97 | 47.25 | 113 | 252 | 0.001 | 1 | 97 |
| 96 | 46.75 | 113 | 247 | 0.001 | 1 | 97 |
| 95 | 46.25 | 113 | 242 | 0.001 | 1 | 98 |
| 94 | 45.75 | 113 | 237 | 0.001 | 1 | 98 |
| 93 | 45.25 | 113 | 232 | 0.001 | 1 | 98 |
| 92 | 44.75 | 114 | 227 | 0.001 | 1 | 98 |
| 91 | 44.25 | 114 | 223 | 0.001 | 1 | 98 |
| 90 | 43.75 | 114 | 218 | 0.001 | 1 | 98 |
| 89 | 43.25 | 114 | 213 | 0.001 | 1 | 98 |
| 88 | 42.75 | 114 | 209 | 0.001 | 1 | 98 |
| 87 | 42.25 | 114 | 204 | 0.001 | 1 | 99 |
| 86 | 41.75 | 114 | 199 | 0.001 | 1 | 99 |
| 85 | 41.25 | 115 | 195 | 0.001 | 1 | 99 |
| 84 | 40.75 | 115 | 190 | 0.001 | 1 | 99 |
| 83 | 40.25 | 115 | 186 | 0.001 | 1 | 99 |
| 82 | 39.75 | 115 | 182 | 0.001 | 1 | 99 |
| 81 | 39.25 | 115 | 177 | 0.001 | 1 | 99 |
| 80 | 38.75 | 115 | 173 | 0.001 | 1 | 99 |
| 79 | 38.25 | 115 | 169 | 0.001 | 1 | 99 |
| 78 | 37.75 | 115 | 165 | 0.001 | 1 | 100 |
| 77 | 37.25 | 116 | 160 | 0.001 | 1 | 100 |
| 76 | 36.83 | 76 | 104 | 0.000 | 1 | 66 |
| 75 | 36.58 | 42 | 56 | 0.000 | 0 | 36 |
| 74 | 36.25 | 122 | 161 | 0.001 | 1 | 105 |
| 73 | 35.83 | 82 | 105 | 0.000 | 1 | 70 |
| 72 | 35.58 | 62 | 79 | 0.000 | 0 | 54 |
| 71 | 35.25 | 187 | 233 | 0.001 | 1 | 161 |
| 70 | 34.75 | 187 | 226 | 0.001 | 1 | 162 |
| 69 | 34.25 | 188 | 220 | 0.001 | 1 | 162 |
| 68 | 33.75 | 188 | 214 | 0.001 | 1 | 162 |
| 67 | 33.25 | 188 | 208 | 0.001 | 1 | 162 |
| 66 | 32.75 | 189 | 202 | $0.001$ | 1 | 163 |
| 65 | 32.25 | 189 | 197 | 0.001 | 1 | 163 |
| 64 | 31.75 | 189 | 191 | 0.001 | 1 | 163 |
| 63 | 31.25 | 133 | 130 | 0.000 | 1 | 115 |
| 62 | 30.75 | 134 | 126 | 0.000 | 1 | 115 |
| 61 | 30.25 | 134 | 122 | 0.000 | 1 | 115 |
| 60 59 | 29.75 29.25 | $134$ | $118$ | $0.000$ | 1 | 115 |
| 58 | 29.25 28.75 | 134 134 | 115 | $\begin{aligned} & 0.000 \\ & 0.000 \end{aligned}$ | 1 | 116 116 |
| 57 | 28.25 | 134 | 107 | 0.000 | 1 | 116 |
| 56 | 27.75 | 135 | 104 | 0.000 | 1 | 116 |
| 55 | 27.25 | 135 | 100 | 0.000 | 0 | 116 |
| 54 | 26.75 | 135 | 96 | 0.000 | 0 | 116 |
| 53 | 26.25 | 135 | 93 | 0.000 | 0 | 116 |
| 52 | 25.75 | 135 | 90 | 0.000 | 0 | 117 |
| 51 | 25.25 | 135 | 86 | 0.000 | 0 | 117 |
| 50 | 24.75 | 135 | 83 | 0.000 | 0 | 117 |
| 49 | 24.25 | 136 | 80 | 0.000 | 0 | 117 |
| 48 | 23.75 | 136 | 77 | 0.000 | 0 | 117 |
| 47 | 23.25 | 136 | 73 | 0.000 | 0 | 117 |
| 46 | 22.75 | 136 | 70 | 0.000 | 0 | 117 |
| 45 | 22.25 | 136 | 67 | 0.000 | 0 | 118 |
| 44 | 21.75 | 136 | 65 | 0.000 | 0 | 118 |
| 43 | 21.25 | 137 | 62 | 0.000 | 0 | 118 |
| 42 | 20.75 | 137 | 59 | 0.000 | 0 | 118 |
| 41 | 20.25 | 137 | 56 | 0.000 | 0 | 118 |
| 40 | 19.75 | 137 | 53 | 0.000 | 0 | 118 |
| 39 | 19.25 | 137 | 51 | 0.000 | 0 | 118 |


| Site Number: | 302494 | Code: ANSI/TIA-222-G | C2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm -Haddam, CT | Engineering Number: OAA712589 C3 05 | $4 / 24 / 20185: 54: 38$ PM |

Customer: SPRINT NEXTEL

| 38 | 18.75 | 137 | 48 | 0.000 | 0 | 119 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 37 | 18.25 | 138 | 46 | 0.000 | 0 | 119 |
| 36 | 17.75 | 138 | 43 | 0.000 | 0 | 119 |
| 35 | 17.25 | 138 | 41 | 0.000 | 0 | 119 |
| 34 | 16.75 | 138 | 39 | 0.000 | 0 | 119 |
| 33 | 16.25 | 138 | 36 | 0.000 | 0 | 119 |
| 32 | 15.75 | 138 | 34 | 0.000 | 0 | 119 |
| 31 | 15.25 | 139 | 32 | 0.000 | 0 | 119 |
| 30 | 14.75 | 139 | 30 | 0.000 | 0 | 120 |
| 29 | 14.25 | 139 | 28 | 0.000 | 0 | 120 |
| 28 | 13.75 | 139 | 26 | 0.000 | 0 | 120 |
| 27 | 13.25 | 139 | 24 | 0.000 | 0 | 120 |
| 26 | 12.75 | 139 | 23 | 0.000 | 0 | 120 |
| 25 | 12.25 | 140 | 21 | 0.000 | 0 | 120 |
| 24 | 11.75 | 140 | 19 | 0.000 | 0 | 120 |
| 23 | 11.25 | 140 | 18 | 0.000 | 0 | 121 |
| 22 | 10.75 | 140 | 16 | 0.000 | 0 | 121 |
| 21 | 10.25 | 140 | 15 | 0.000 | 0 | 121 |
| 20 | 9.75 | 140 | 13 | 0.000 | 0 | 121 |
| 19 | 9.25 | 140 | 12 | 0.000 | 0 | 121 |
| 18 | 8.75 | 141 | 11 | 0.000 | 0 | 121 |
| 17 | 8.25 | 141 | 10 | 0.000 | 0 | 121 |
| 16 | 7.75 | 118 | 7 | 0.000 | 0 | 102 |
| 15 | 7.25 | 118 | 6 | 0.000 | 0 | 102 |
| 14 | 6.75 | 118 | 5 | 0.000 | 0 | 102 |
| 13 | 6.25 | 119 | 5 | 0.000 | 0 | 102 |
| 12 | 5.75 | 119 | 4 | 0.000 | 0 | 102 |
| 11 | 5.25 | 119 | 3 | 0.000 | 0 | 103 |
| 10 | 4.75 | 119 | 3 | 0.000 | 0 | 103 |
| 9 | 4.25 | 119 | 2 | 0.000 | 0 | 103 |
| 8 | 3.75 | 119 | 2 | 0.000 | 0 | 103 |
| 7 | 3.25 | 120 | 1 | 0.000 | 0 | 103 |
| 6 | 2.75 | 120 | 1 | 0.000 | 0 | 103 |
| 5 | 2.25 | 120 | 1 | 0.000 | 0 | 103 |
| 4 | 1.75 | 120 | 0 | 0.000 | 0 | 104 |
| 3 | 1.25 | 120 | 0 | 0.000 | 0 | 104 |
| 2 | 0.75 | 120 | 0 | 0.000 | 0 | 104 |
| 1 | 0.25 | 121 | 0 | 0.000 | 0 | 104 |
| Kaelus DBC0061F1V51- | 150.00 | 153 | 3,443 | 0.013 | 17 | 132 |
| Decibel DB910CE-M | 150.00 | 16 | 360 | 0.001 | 2 | 14 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 715 | 0.003 | 4 | 27 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 715 | 0.003 | 4 | 27 |
| Powerwave LGP17201 <br> Ericsson RRUS 11 (Ba | $150.00$ | 186 | 4,185 | 0.015 | 21 | 160 |
| Ericsson RRUS 11 (Ba | 150.00 | 165 | 3,713 | 0.014 | 18 | 142 |
| Ericsson RRUS 32 (50 | 150.00 | 152 | 3,429 | 0.012 | 17 | 131 |
| Ericsson RRUS 32 B2 | 150.00 | 159 | 3,577 | 0.013 | 18 | 137 |
| Powerwave Allgon 777 <br> KMW AM-X-CD-16-65-00 | 150.00 150.00 | 105 97 | 2,363 | 0.009 0.008 | 12 | 91 84 |
| Quintel QS66512-2 | 150.00 | 333 | 7,493 | 0.027 | 37 | 287 |
| Powerwave P65-17-XLH | 150.00 | 50 | 1,125 | 0.004 | 6 | 43 |
| Round Platform w/ Ha | 150.00 | 2,000 | 45,000 | 0.164 | 224 | 1,725 |
| RFS APXV18-206517LS- | 141.00 | 66 | 1,312 | 0.005 | 7 | 57 |
| Alcatel-Lucent RRH2x | 131.00 | 317 | 5,447 | 0.020 | 27 | 274 |
| Alcatel-Lucent 1900 | 131.00 | 180 | 3,089 | 0.011 | 15 | 155 |
| Decibel DB844H90E-XY | 131.00 | 84 | 1,442 | 0.005 | 7 | 72 |
| Alcatel-Lucent TD-RR | 131.00 | 210 | 3,604 | 0.013 | 18 | 181 |
| RFS APXVTM14-ALU-120 | 131.00 | 169 | 2,893 | 0.011 | 14 | 145 |
| Commscope NNVV-65B-R | 131.00 | 232 | 3,985 | 0.014 | 20 | 200 |
| Round Platform w/ Ha | 131.00 | 2,000 | 34,322 | 0.125 | 171 | 1,725 |
|  |  | 35,073 | 274,918 | 1.000 | 1,368 | 30,249 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

Engineering Number: OAA712589_C3_05 4/24/2018 5:54:38 PM

Customer: $\quad$ SPRINT NEXTEL

Load Case (1.2+0.2Sds) * DL + E ELFM
Seismic Equivalent Lateral Forces Method
Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{gathered} \mathrm{Pu} \\ \mathrm{FY}(-) \\ \text { (kips) } \end{gathered}$ | $\begin{aligned} & \mathrm{Vu} \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ | $\begin{gathered} \text { Tu } \\ \text { MY } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MZ} \\ \text { (ft-kips) } \end{gathered}$ | Mu MX (ft-kips) | Resultant Moment (ft-kips) | $\begin{gathered} \text { phi } \\ \text { Pn } \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ V n \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ \text { Tn } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{phi} \\ \mathrm{Mn} \\ \text { (ft-kips) } \end{gathered}$ | Total Deflect (in) | $\begin{aligned} & \text { Rotation } \\ & \text { (deg) } \end{aligned}$ | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -43.26 | -1.37 | 0.00 | -176.90 | 0.00 | 176.90 | 3,157.1 | 1,578.58 | 4,812. | 2,376.61 | 0.00 | 0.00 | 0.054 |
| 0.50 | -43.11 | -1.37 | 0.00 | -176.22 | 0.00 | 176.22 | 3,152.93 | 1,576.47 | 4,795.55 | 2,368.34 | 0.00 | 0.00 | 0.054 |
| 1.00 | -42.96 | -1.37 | 0.00 | -175.53 | 0.00 | 175.53 | 3,148.69 | 1,574.34 | 4,778.83 | 2,360.09 | 0.00 | 0.00 | 0.054 |
| 1.50 | -42.81 | -1.37 | 0.00 | -174.85 | 0.00 | 174.85 | 3,144.43 | 1,572.22 | 4,762.13 | 2,351.84 | 0.00 | -0.01 | 0.054 |
| 2.00 | -42.66 | -1.37 | 0.00 | -174.16 | 0.00 | 174.16 | 3,140.17 | 1,570.08 | 4,745.43 | 2,343.59 | 0.00 | -0.01 | 0.054 |
| 2.50 | -42.51 | -1.37 | 0.00 | -173.48 | 0.00 | 173.48 | 3,135.89 | 1,567.94 | 4,728.75 | 2,335.35 | 0.00 | -0.01 | 0.054 |
| 3.00 | -42.36 | -1.37 | 0.00 | -172.79 | 0.00 | 172.79 | 3,131.60 | 1,565.80 | 4,712.08 | 2,327.12 | 0.00 | -0.01 | 0.054 |
| 3.50 | -42.22 | -1.38 | 0.00 | -172.10 | 0.00 | 172.10 | 3,127.31 | 1,563.65 | 4,695.42 | 2,318.89 | 0.01 | -0.01 | 0.054 |
| 4.00 | -42.07 | -1.38 | 0.00 | -171.42 | 0.00 | 171.42 | 3,123.00 | 1,561.50 | 4,678.77 | 2,310.67 | 0.01 | -0.02 | 0.053 |
| 4.50 | -41.92 | -1.38 | 0.00 | -170.73 | 0.00 | 170.73 | 3,118.68 | 1,559.34 | 4,662.14 | 2,302.45 | 0.01 | -0.02 | 0.053 |
| 5.00 | -41.77 | -1.38 | 0.00 | -170.04 | 0.00 | 170.04 | 3,114.35 | 1,557.18 | 4,645.51 | 2,294.24 | 0.01 | -0.02 | 0.053 |
| 5.50 | -41.63 | -1.38 | 0.00 | -169.35 | 0.00 | 169.35 | 3,110.02 | 1,555.01 | 4,628.91 | 2,286.04 | 0.01 | -0.02 | 0.053 |
| 6.00 | -41.48 | -1.38 | 0.00 | -168.66 | 0.00 | 168.66 | 3,105.67 | 1,552.83 | 4,612.31 | 2,277.85 | 0.02 | -0.02 | 0.053 |
| 6.50 | -41.33 | -1.38 | 0.00 | -167.97 | 0.00 | 167.97 | 3,101.31 | 1,550.65 | 4,595.73 | 2,269.66 | 0.02 | -0.03 | 0.053 |
| 7.00 | -41.19 | -1.39 | 0.00 | -167.27 | 0.00 | 167.27 | 3,096.94 | 1,548.47 | 4,579.16 | 2,261.47 | 0.02 | -0.03 | 0.053 |
| 7.50 | -41.04 | -1.39 | 0.00 | -166.58 | 0.00 | 166.58 | 3,092.56 | 1,546.28 | 4,562.60 | 2,253.30 | 0.02 | -0.03 | 0.053 |
| 8.00 | -40.87 | -1.39 | 0.00 | -165.89 | 0.00 | 165.89 | 3,088.17 | 1,544.08 | 4,546.06 | 2,245.13 | 0.03 | -0.03 | 0.053 |
| 8.50 | -40.69 | -1.39 | 0.00 | -165.19 | 0.00 | 165.19 | 3,083.77 | 1,541.88 | 4,529.53 | 2,236.96 | 0.03 | -0.03 | 0.053 |
| 9.00 | -40.52 | -1.39 | 0.00 | -164.50 | 0.00 | 164.50 | 3,079.36 | 1,539.68 | 4,513.01 | 2,228.81 | 0.03 | -0.04 | 0.053 |
| 9.50 | -40.34 | -1.39 | 0.00 | -163.80 | 0.00 | 163.80 | 3,074.94 | 1,537.47 | 4,496.51 | 2,220.66 | 0.04 | -0.04 | 0.052 |
| 10.00 | -40.17 | -1.39 | 0.00 | -163.11 | 0.00 | 163.11 | 3,070.50 | 1,535.25 | 4,480.02 | 2,212.51 | 0.04 | -0.04 | 0.052 |
| 10.50 | -40.00 | -1.39 | 0.00 | -162.41 | 0.00 | 162.41 | 3,066.06 | 1,533.03 | 4,463.54 | 2,204.38 | 0.05 | -0.04 | 0.052 |
| 11.00 | -39.83 | -1.40 | 0.00 | -161.72 | 0.00 | 161.72 | 3,061.61 | 1,530.80 | 4,447.08 | 2,196.25 | 0.05 | -0.04 | 0.052 |
| 11.50 | -39.65 | -1.40 | 0.00 | -161.02 | 0.00 | 161.02 | 3,057.15 | 1,528.57 | 4,430.63 | 2,188.12 | 0.06 | -0.05 | 0.052 |
| 12.00 | -39.48 | -1.40 | 0.00 | -160.32 | 0.00 | 160.32 | 3,052.67 | 1,526.34 | 4,414.20 | 2,180.01 | 0.06 | -0.05 | 0.052 |
| 12.50 | -39.31 | -1.40 | 0.00 | -159.62 | 0.00 | 159.62 | 3,048.19 | 1,524.09 | 4,397.78 | 2,171.90 | 0.07 | -0.05 | 0.052 |
| 13.00 | -39.13 | -1.40 | 0.00 | -158.92 | 0.00 | 158.92 | 3,043.69 | 1,521.85 | 4,381.37 | 2,163.80 | 0.07 | -0.05 | 0.052 |
| 13.50 | -38.96 | -1.40 | 0.00 | -158.22 | 0.00 | 158.22 | 3,039.19 | 1,519.59 | 4,364.98 | 2,155.70 | 0.08 | -0.05 | 0.052 |
| 14.00 | -38.79 | -1.40 | 0.00 | -157.52 | 0.00 | 157.52 | 3,034.67 | 1,517.34 | 4,348.61 | 2,147.61 | 0.08 | -0.06 | 0.052 |
| 14.50 | -38.62 | -1.40 | 0.00 | -156.82 | 0.00 | 156.82 | 3,030.15 | 1,515.07 | 4,332.24 | 2,139.53 | 0.09 | -0.06 | 0.051 |
| 15.00 | -38.45 | -1.40 | 0.00 | -156.12 | 0.00 | 156.12 | 3,025.61 | 1,512.81 | 4,315.90 | 2,131.46 | 0.09 | -0.06 | 0.051 |
| 15.50 | -38.28 | -1.41 | 0.00 | -155.42 | 0.00 | 155.42 | 3,021.07 | 1,510.53 | 4,299.57 | 2,123.39 | 0.10 | -0.06 | 0.051 |
| 16.00 | -38.11 | -1.41 | 0.00 | -154.71 | 0.00 | 154.71 | 3,016.51 | 1,508.25 | 4,283.25 | 2,115.33 | 0.11 | -0.06 | 0.051 |
| 16.50 | -37.93 | -1.41 | 0.00 | -154.01 | 0.00 | 154.01 | 3,011.94 | 1,505.97 | 4,266.95 | 2,107.28 | 0.11 | -0.07 | 0.051 |
| 17.00 | -37.76 | -1.41 | 0.00 | -153.31 | 0.00 | 153.31 | 3,007.37 | 1,503.68 | 4,250.66 | 2,099.24 | 0.12 | -0.07 | 0.051 |
| 17.50 | -37.59 | -1.41 | 0.00 | -152.60 | 0.00 | 152.60 | 3,002.78 | 1,501.39 | 4,234.39 | 2,091.20 | 0.13 | -0.07 | 0.051 |
| 18.00 | -37.42 | -1.41 | 0.00 | -151.90 | 0.00 | 151.90 | 2,998.18 | 1,499.09 | 4,218.13 | 2,083.18 | 0.14 | -0.07 | 0.051 |
| 18.50 | -37.25 | -1.41 | 0.00 | -151.19 | 0.00 | 151.19 | 2,993.57 | 1,496.79 | 4,201.89 | 2,075.15 | 0.14 | -0.07 | 0.051 |
| 19.00 | -37.08 | -1.41 | 0.00 | -150.49 | 0.00 | 150.49 | 2,988.95 | 1,494.48 | 4,185.66 | 2,067.14 | 0.15 | -0.08 | 0.050 |
| 19.50 | -36.91 | -1.41 | 0.00 | -149.78 | 0.00 | 149.78 | 2,984.32 | 1,492.16 | 4,169.45 | 2,059.13 | 0.16 | -0.08 | 0.050 |
| 20.00 | -36.74 | -1.41 | 0.00 | -149.07 | 0.00 | 149.07 | 2,979.68 | 1,489.84 | 4,153.25 | 2,051.14 | 0.17 | -0.08 | 0.050 |
| 20.50 | -36.57 | -1.41 | 0.00 | -148.37 | 0.00 | 148.37 | 2,975.03 | 1,487.52 | 4,137.08 | 2,043.15 | 0.18 | -0.08 | 0.050 |
| 21.00 | -36.41 | -1.42 | 0.00 | -147.66 | 0.00 | 147.66 | 2,970.37 | 1,485.19 | 4,120.91 | 2,035.16 | 0.19 | -0.09 | 0.050 |
| 21.50 | -36.24 | -1.42 | 0.00 | -146.95 | 0.00 | 146.95 | 2,965.70 | 1,482.85 | 4,104.77 | 2,027.19 | 0.20 | -0.09 | 0.050 |
| 22.00 | -36.07 | -1.42 | 0.00 | -146.25 | 0.00 | 146.25 | 2,961.02 | 1,480.51 | 4,088.63 | 2,019.22 | 0.20 | -0.09 | 0.050 |
| 22.50 | -35.90 | -1.42 | 0.00 | -145.54 | 0.00 | 145.54 | 2,956.33 | 1,478.16 | 4,072.52 | 2,011.26 | 0.21 | -0.09 | 0.050 |
| 23.00 | -35.73 | -1.42 | 0.00 | -144.83 | 0.00 | 144.83 | 2,951.62 | 1,475.81 | 4,056.42 | 2,003.31 | 0.22 | -0.09 | 0.050 |
| 23.50 | -35.56 | -1.42 | 0.00 | -144.12 | 0.00 | 144.12 | 2,946.91 | 1,473.46 | 4,040.34 | 1,995.37 | 0.23 | -0.10 | 0.049 |
| 24.00 | -35.39 | -1.42 | 0.00 | -143.41 | 0.00 | 143.41 | 2,942.19 | 1,471.09 | 4,024.27 | 1,987.44 | 0.24 | -0.10 | 0.049 |
| 24.50 | -35.23 | -1.42 | 0.00 | -142.70 | 0.00 | 142.70 | 2,937.46 | 1,468.73 | 4,008.22 | 1,979.51 | 0.25 | -0.10 | 0.049 |
| 25.00 | -35.06 | -1.42 | 0.00 | -141.99 | 0.00 | 141.99 | 2,932.71 | 1,466.36 | 3,992.19 | 1,971.59 | 0.26 | -0.10 | 0.049 |
| 25.50 | -34.89 | -1.42 | 0.00 | -141.28 | 0.00 | 141.28 | 2,927.96 | 1,463.98 | 3,976.18 | 1,963.68 | 0.28 | -0.10 | 0.049 |
| 26.00 | -34.72 | -1.42 | 0.00 | -140.57 | 0.00 | 140.57 | 2,923.19 | 1,461.60 | 3,960.18 | 1,955.78 | 0.29 | -0.11 | 0.049 |
| 26.50 | -34.56 | -1.42 | 0.00 | -139.86 | 0.00 | 139.86 | 2,918.42 | 1,459.21 | 3,944.20 | 1,947.89 | 0.30 | -0.11 | 0.049 |
| 27.00 | -34.39 | -1.42 | 0.00 | -139.15 | 0.00 | 139.15 | 2,913.63 | 1,456.82 | 3,928.23 | 1,940.01 | 0.31 | -0.11 | 0.049 |
| 27.50 | -34.22 | -1.42 | 0.00 | -138.44 | 0.00 | 138.44 | 2,910.08 | 1,455.04 | 3,913.96 | 1,932.96 | 0.32 | -0.11 | 0.049 |

Customer: SPRINT NEXTEL

| 28.00 | -34.06 | -1.42 | 0.00 | -137.73 | 0.00 | 137.73 | 2,903.11 1,451.55 | 3,895.11 1,923.65 | 0.33 | -0.11 | 0.048 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 28.50 | -33.89 | -1.42 | 0.00 | -137.01 | 0.00 | 137.01 | 2,896.13 1,448.07 | 3,876.32 1,914.37 | 0.34 | -0.12 | 0.048 |
| 29.00 | -33.73 | -1.42 | 0.00 | -136.30 | 0.00 | 136.30 | 2,889.16 1,444.58 | 3,857.57 1,905.11 | 0.36 | -0.12 | 0.048 |
| 29.50 | -33.56 | -1.42 | 0.00 | -135.59 | 0.00 | 135.59 | 2,882.19 1,441.09 | 3,838.86 1,895.87 | 0.37 | -0.12 | 0.048 |
| 30.00 | -33.40 | -1.42 | 0.00 | -134.88 | 0.00 | 134.88 | 2,875.21 1,437.61 | 3,820.20 1,886.65 | 0.38 | -0.12 | 0.048 |
| 30.50 | -33.23 | -1.42 | 0.00 | -134.17 | 0.00 | 134.17 | 2,868.24 1,434.12 | 3,801.59 1,877.46 | 0.40 | -0.13 | 0.048 |
| 31.00 | -33.06 | -1.42 | 0.00 | -133.45 | 0.00 | 133.45 | 2,861.26 1,430.63 | 3,783.02 1,868.29 | 0.41 | -0.13 | 0.048 |
| 31.50 | -32.83 | -1.42 | 0.00 | -132.74 | 0.00 | 132.74 | 2,854.29 1,427.15 | 3,764.50 1,859.14 | 0.42 | -0.13 | 0.048 |
| 32.00 | -32.60 | -1.42 | 0.00 | -132.03 | 0.00 | 132.03 | 2,847.32 1,423.66 | 3,746.02 1,850.02 | 0.44 | -0.13 | 0.047 |
| 32.50 | -32.36 | -1.42 | 0.00 | -131.32 | 0.00 | 131.32 | 2,840.34 1,420.17 | 3,727.58 1,840.91 | 0.45 | -0.13 | 0.047 |
| 33.00 | -32.13 | -1.42 | 0.00 | -130.61 | 0.00 | 130.61 | 2,833.37 1,416.69 | 3,709.20 1,831.83 | 0.46 | -0.14 | 0.047 |
| 33.50 | -31.90 | -1.42 | 0.00 | -129.89 | 0.00 | 129.89 | 2,826.40 1,413.20 | 3,690.85 1,822.77 | 0.48 | -0.14 | 0.047 |
| 34.00 | -31.66 | -1.42 | 0.00 | -129.18 | 0.00 | 129.18 | 2,819.42 1,409.71 | 3,672.56 1,813.74 | 0.49 | -0.14 | 0.047 |
| 34.50 | -31.43 | -1.42 | 0.00 | -128.47 | 0.00 | 128.47 | 2,812.45 1,406.22 | 3,654.31 1,804.72 | 0.51 | -0.14 | 0.047 |
| 35.00 | -31.20 | -1.42 | 0.00 | -127.76 | 0.00 | 127.76 | 2,805.48 1,402.74 | 3,636.10 1,795.73 | 0.52 | -0.14 | 0.046 |
| 35.50 | -31.12 | -1.42 | 0.00 | -127.05 | 0.00 | 127.05 | 2,798.50 1,399.25 | 3,617.94 1,786.76 | 0.54 | -0.15 | 0.046 |
| 35.67 | -31.02 | -1.42 | 0.00 | -126.81 | 0.00 | 126.81 | 2,248.07 1,124.03 | 2,973.91 1,468.70 | 0.54 | -0.15 | 0.053 |
| 36.00 | -30.87 | -1.42 | 0.00 | -126.34 | 0.00 | 126.34 | 2,245.83 1,122.91 | 2,966.06 1,464.83 | 0.55 | -0.15 | 0.053 |
| 36.50 | -30.82 | -1.42 | 0.00 | -125.63 | 0.00 | 125.63 | 2,242.46 1,121.23 | 2,954.30 1,459.02 | 0.57 | -0.15 | 0.053 |
| 36.67 | -30.73 | -1.42 | 0.00 | -125.39 | 0.00 | 125.39 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.57 | -0.15 | 0.053 |
| 36.67 | -30.73 | -1.42 | 0.00 | -125.39 | 0.00 | 125.39 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.57 | -0.15 | 0.057 |
| 37.00 | -30.58 | -1.42 | 0.00 | -124.92 | 0.00 | 124.92 | 2,239.08 1,119.54 | 2,942.55 1,453.22 | 0.58 | -0.15 | 0.057 |
| 37.50 | -30.44 | -1.42 | 0.00 | -124.21 | 0.00 | 124.21 | 2,235.69 1,117.84 | 2,930.81 1,447.42 | 0.60 | -0.16 | 0.057 |
| 38.00 | -30.30 | -1.42 | 0.00 | -123.50 | 0.00 | 123.50 | 2,232.29 1,116.14 | 2,919.08 1,441.62 | 0.62 | -0.16 | 0.056 |
| 38.50 | -30.15 | -1.42 | 0.00 | -122.79 | 0.00 | 122.79 | 2,228.88 1,114.44 | 2,907.36 1,435.83 | 0.63 | -0.16 | 0.056 |
| 39.00 | -30.01 | -1.42 | 0.00 | -122.08 | 0.00 | 122.08 | 2,225.46 1,112.73 | 2,895.64 1,430.05 | 0.65 | -0.16 | 0.056 |
| 39.50 | -29.87 | -1.42 | 0.00 | -121.36 | 0.00 | 121.36 | 2,222.03 1,111.01 | 2,883.93 1,424.27 | 0.67 | -0.16 | 0.056 |
| 40.00 | -29.73 | -1.42 | 0.00 | -120.65 | 0.00 | 120.65 | 2,218.59 1,109.29 | 2,872.23 1,418.49 | 0.69 | -0.17 | 0.056 |
| 40.50 | -29.59 | -1.42 | 0.00 | -119.94 | 0.00 | 119.94 | 2,215.14 1,107.57 | 2,860.55 1,412.72 | 0.70 | -0.17 | 0.056 |
| 41.00 | -29.44 | -1.42 | 0.00 | -119.23 | 0.00 | 119.23 | 2,211.67 1,105.84 | 2,848.87 1,406.95 | 0.72 | -0.17 | 0.055 |
| 41.50 | -29.30 | -1.42 | 0.00 | -118.52 | 0.00 | 118.52 | 2,208.20 1,104.10 | 2,837.20 1,401.18 | 0.74 | -0.17 | 0.055 |
| 42.00 | -29.16 | -1.42 | 0.00 | -117.81 | 0.00 | 117.81 | 2,204.72 1,102.36 | 2,825.53 1,395.43 | 0.76 | -0.18 | 0.055 |
| 42.50 | -29.02 | -1.42 | 0.00 | -117.10 | 0.00 | 117.10 | 2,201.23 1,100.61 | 2,813.88 1,389.67 | 0.78 | -0.18 | 0.055 |
| 43.00 | -28.88 | -1.42 | 0.00 | -116.39 | 0.00 | 116.39 | 2,197.72 1,098.86 | 2,802.24 1,383.92 | 0.79 | -0.18 | 0.055 |
| 43.50 | -28.74 | -1.42 | 0.00 | -115.68 | 0.00 | 115.68 | 2,194.21 1,097.10 | 2,790.61 1,378.18 | 0.81 | -0.18 | 0.054 |
| 44.00 | -28.60 | -1.42 | 0.00 | -114.97 | 0.00 | 114.97 | 2,190.68 1,095.34 | 2,778.98 1,372.44 | 0.83 | -0.19 | 0.054 |
| 44.50 | -28.46 | -1.42 | 0.00 | -114.26 | 0.00 | 114.26 | 2,187.15 1,093.57 | 2,767.37 1,366.70 | 0.85 | -0.19 | 0.054 |
| 45.00 | -28.32 | -1.42 | 0.00 | -113.55 | 0.00 | 113.55 | 2,183.60 1,091.80 | 2,755.77 1,360.97 | 0.87 | -0.19 | 0.054 |
| 45.50 | -28.18 | -1.42 | 0.00 | -112.84 | 0.00 | 112.84 | 2,180.05 1,090.02 | 2,744.17 1,355.24 | 0.89 | -0.19 | 0.054 |
| 46.00 | -28.04 | -1.42 | 0.00 | -112.13 | 0.00 | 112.13 | 2,176.48 1,088.24 | 2,732.59 1,349.52 | 0.91 | -0.20 | 0.054 |
| 46.50 | -27.90 | -1.42 | 0.00 | -111.43 | 0.00 | 111.43 | 2,172.91 1,086.45 | 2,721.02 1,343.81 | 0.93 | -0.20 | 0.053 |
| 47.00 | -27.76 | -1.42 | 0.00 | -110.72 | 0.00 | 110.72 | 2,169.32 1,084.66 | 2,709.45 1,338.10 | 0.96 | -0.20 | 0.053 |
| 47.50 | -27.62 | -1.42 | 0.00 | -110.01 | 0.00 | 110.01 | 2,165.72 1,082.86 | 2,697.90 1,332.39 | 0.98 | -0.20 | 0.053 |
| 48.00 | -27.48 | -1.42 | 0.00 | -109.30 | 0.00 | 109.30 | 2,162.11 1,081.06 | 2,686.36 1,326.69 | 1.00 | -0.21 | 0.053 |
| 48.50 | -27.34 | -1.41 | 0.00 | -108.59 | 0.00 | 108.59 | 2,158.50 1,079.25 | 2,674.83 1,321.00 | 1.02 | -0.21 | 0.053 |
| 49.00 | -27.20 | -1.41 | 0.00 | -107.89 | 0.00 | 107.89 | 2,154.87 1,077.43 | 2,663.31 1,315.31 | 1.04 | -0.21 | 0.052 |
| 49.50 | -27.06 | -1.41 | 0.00 | -107.18 | 0.00 | 107.18 | 2,151.23 1,075.61 | 2,651.80 1,309.62 | 1.06 | -0.21 | 0.052 |
| 50.00 | -26.92 | -1.41 | 0.00 | -106.47 | 0.00 | 106.47 | 2,147.58 1,073.79 | 2,640.30 1,303.95 | 1.09 | -0.22 | 0.052 |
| 50.50 | -26.78 | -1.41 | 0.00 | -105.77 | 0.00 | 105.77 | 2,143.92 1,071.96 | 2,628.81 1,298.27 | 1.11 | -0.22 | 0.052 |
| 51.00 | -26.64 | -1.41 | 0.00 | -105.06 | 0.00 | 105.06 | 2,140.25 1,070.13 | 2,617.34 1,292.60 | 1.13 | -0.22 | 0.052 |
| 51.50 | -26.50 | -1.41 | 0.00 | -104.35 | 0.00 | 104.35 | 2,136.57 1,068.29 | 2,605.87 1,286.94 | 1.16 | -0.22 | 0.051 |
| 52.00 | -26.37 | -1.41 | 0.00 | -103.65 | 0.00 | 103.65 | 2,132.88 1,066.44 | 2,594.42 1,281.29 | 1.18 | -0.23 | 0.051 |
| 52.50 | -26.23 | -1.41 | 0.00 | -102.95 | 0.00 | 102.95 | 2,129.18 1,064.59 | 2,582.98 1,275.64 | 1.20 | -0.23 | 0.051 |
| 53.00 | -26.09 | -1.41 | 0.00 | -102.24 | 0.00 | 102.24 | 2,125.47 1,062.73 | 2,571.55 1,269.99 | 1.23 | -0.23 | 0.051 |
| 53.50 | -25.95 | -1.41 | 0.00 | -101.54 | 0.00 | 101.54 | 2,121.75 1,060.87 | 2,560.13 1,264.35 | 1.25 | -0.23 | 0.051 |
| 54.00 | -25.82 | -1.40 | 0.00 | -100.84 | 0.00 | 100.84 | 2,118.01 1,059.01 | 2,548.72 1,258.72 | 1.28 | -0.24 | 0.050 |
| 54.50 | -25.68 | -1.40 | 0.00 | -100.13 | 0.00 | 100.13 | 2,114.27 1,057.14 | 2,537.32 1,253.09 | 1.30 | -0.24 | 0.050 |
| 55.00 | -25.54 | -1.40 | 0.00 | -99.43 | 0.00 | 99.43 | 2,110.52 1,055.26 | 2,525.94 1,247.47 | 1.32 | -0.24 | 0.050 |
| 55.50 | -25.40 | -1.40 | 0.00 | -98.73 | 0.00 | 98.73 | 2,106.75 1,053.38 | 2,514.57 1,241.85 | 1.35 | -0.24 | 0.050 |
| 56.00 | -25.27 | -1.40 | 0.00 | -98.03 | 0.00 | 98.03 | 2,102.98 1,051.49 | 2,503.21 1,236.24 | 1.38 | -0.24 | 0.050 |
| 56.50 | -25.13 | -1.40 | 0.00 | -97.33 | 0.00 | 97.33 | 2,099.20 1,049.60 | 2,491.86 1,230.64 | 1.40 | -0.25 | 0.049 |
| 57.00 | -24.99 | -1.40 | 0.00 | -96.63 | 0.00 | 96.63 | 2,095.40 1,047.70 | 2,480.53 1,225.04 | 1.43 | -0.25 | 0.049 |
| 57.50 | -24.86 | -1.40 | 0.00 | -95.93 | 0.00 | 95.93 | 2,091.60 1,045.80 | 2,469.21 1,219.45 | 1.45 | -0.25 | 0.049 |
| 58.00 | -24.72 | -1.39 | 0.00 | -95.23 | 0.00 | 95.23 | 2,087.78 1,043.89 | 2,457.90 1,213.86 | 1.48 | -0.25 | 0.049 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

| 58.50 | -24.59 | -1.39 | 0.00 | -94.54 | 0.00 | 94.54 | 2,083.96 | 1,041.98 | 2,446.60 | 1,208.28 | 1.51 | -0.26 | 0.049 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 59.00 | -24.45 | -1.39 | 0.00 | -93.84 | 0.00 | 93.84 | 2,080.12 | 1,040.06 | 2,435.32 | 1,202.71 | 1.53 | -0.26 | 0.048 |
| 59.50 | -24.31 | -1.39 | 0.00 | -93.14 | 0.00 | 93.14 | 2,076.27 | 1,038.14 | 2,424.04 | 1,197.14 | 1.56 | -0.26 | 0.048 |
| 60.00 | -24.18 | -1.39 | 0.00 | -92.45 | 0.00 | 92.45 | 2,072.41 | 1,036.21 | 2,412.79 | 1,191.58 | 1.59 | -0.26 | 0.048 |
| 60.50 | -24.04 | -1.39 | 0.00 | -91.75 | 0.00 | 91.75 | 2,068.55 | 1,034.27 | 2,401.54 | 1,186.03 | 1.62 | -0.27 | 0.048 |
| 61.00 | -23.91 | -1.39 | 0.00 | -91.06 | 0.00 | 91.06 | 2,064.67 | 1,032.33 | 2,390.31 | 1,180.48 | 1.64 | -0.27 | 0.047 |
| 61.50 | -23.77 | -1.38 | 0.00 | -90.37 | 0.00 | 90.37 | 2,060.78 | 1,030.39 | 2,379.09 | 1,174.94 | 1.67 | -0.27 | 0.047 |
| 62.00 | -23.64 | -1.38 | 0.00 | -89.68 | 0.00 | 89.68 | 2,056.88 | 1,028.44 | 2,367.88 | 1,169.41 | 1.70 | -0.27 | 0.047 |
| 62.50 | -23.50 | -1.38 | 0.00 | -88.99 | 0.00 | 88.99 | 2,052.97 | 1,026.49 | 2,356.69 | 1,163.88 | 1.73 | -0.28 | 0.047 |
| 63.00 | -23.37 | -1.38 | 0.00 | -88.30 | 0.00 | 88.30 | 2,049.05 | 1,024.53 | 2,345.51 | 1,158.36 | 1.76 | -0.28 | 0.047 |
| 63.50 | -23.24 | -1.38 | 0.00 | -87.61 | 0.00 | 87.61 | 2,045.12 | 1,022.56 | 2,334.35 | 1,152.85 | 1.79 | -0.28 | 0.046 |
| 64.00 | -23.10 | -1.37 | 0.00 | -86.92 | 0.00 | 86.92 | 2,041.18 | 1,020.59 | 2,323.20 | 1,147.34 | 1.82 | -0.28 | 0.046 |
| 64.50 | -22.97 | -1.37 | 0.00 | -86.23 | 0.00 | 86.23 | 2,037.23 | 1,018.62 | 2,312.06 | 1,141.84 | 1.85 | -0.29 | 0.046 |
| 65.00 | -22.83 | -1.37 | 0.00 | -85.55 | 0.00 | 85.55 | 2,033.27 | 1,016.64 | 2,300.94 | 1,136.35 | 1.88 | -0.29 | 0.046 |
| 65.50 | -22.70 | -1.37 | 0.00 | -84.86 | 0.00 | 84.86 | 2,029.30 | 1,014.65 | 2,289.83 | 1,130.86 | 1.91 | -0.29 | 0.046 |
| 66.00 | -22.57 | -1.37 | 0.00 | -84.18 | 0.00 | 84.18 | 2,025.32 | 1,012.66 | 2,278.74 | 1,125.38 | 1.94 | -0.29 | 0.045 |
| 66.50 | -22.43 | -1.36 | 0.00 | -83.49 | 0.00 | 83.49 | 2,021.33 | 1,010.66 | 2,267.65 | 1,119.91 | 1.97 | -0.30 | 0.045 |
| 67.00 | -22.30 | -1.36 | 0.00 | -82.81 | 0.00 | 82.81 | 2,016.97 | 1,008.48 | 2,256.19 | 1,114.25 | 2.00 | -0.30 | 0.045 |
| 67.50 | -22.17 | -1.36 | 0.00 | -82.13 | 0.00 | 82.13 | 2,011.16 | 1,005.58 | 2,243.13 | 1,107.80 | 2.03 | -0.30 | 0.045 |
| 68.00 | -22.03 | -1.36 | 0.00 | -81.45 | 0.00 | 81.45 | 2,005.34 | 1,002.67 | 2,230.12 | 1,101.37 | 2.06 | -0.30 | 0.045 |
| 68.50 | -21.90 | -1.36 | 0.00 | -80.77 | 0.00 | 80.77 | 1,999.53 | 999.77 | 2,217.14 | 1,094.96 | 2.10 | -0.30 | 0.044 |
| 69.00 | -21.77 | -1.35 | 0.00 | -80.09 | 0.00 | 80.09 | 1,993.72 | 996.86 | 2,204.19 | 1,088.57 | 2.13 | -0.31 | 0.044 |
| 69.50 | -21.64 | -1.35 | 0.00 | -79.42 | 0.00 | 79.42 | 1,987.91 | 993.96 | 2,191.29 | 1,082.20 | 2.16 | -0.31 | 0.044 |
| 70.00 | -21.46 | -1.35 | 0.00 | -78.74 | 0.00 | 78.74 | 1,982.10 | 991.05 | 2,178.42 | 1,075.84 | 2.19 | -0.31 | 0.044 |
| 70.50 | -21.28 | -1.34 | 0.00 | -78.07 | 0.00 | 78.07 | 1,976.29 | 988.14 | 2,165.59 | 1,069.51 | 2.23 | -0.31 | 0.043 |
| 71.00 | -21.10 | -1.34 | 0.00 | -77.40 | 0.00 | 77.40 | 1,970.48 | 985.24 | 2,152.80 | 1,063.19 | 2.26 | -0.32 | 0.043 |
| 71.50 | -20.93 | -1.34 | 0.00 | -76.73 | 0.00 | 76.73 | 1,964.67 | 982.33 | 2,140.05 | 1,056.89 | 2.29 | -0.32 | 0.043 |
| 72.00 | -20.75 | -1.33 | 0.00 | -76.06 | 0.00 | 76.06 | 1,958.85 | 979.43 | 2,127.34 | 1,050.61 | 2.32 | -0.32 | 0.042 |
| 72.50 | -20.57 | -1.33 | 0.00 | -75.39 | 0.00 | 75.39 | 1,953.04 | 976.52 | 2,114.66 | 1,044.35 | 2.36 | -0.32 | 0.042 |
| 73.00 | -20.46 | -1.33 | 0.00 | -74.73 | 0.00 | 74.73 | 1,947.23 | 973.62 | 2,102.02 | 1,038.11 | 2.39 | -0.33 | 0.042 |
| 73.33 | -20.40 | -1.32 | 0.00 | -74.29 | 0.00 | 74.29 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 2.42 | -0.33 | 0.042 |
| 73.33 | -20.40 | -1.32 | 0.00 | -74.29 | 0.00 | 74.29 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 2.42 | -0.33 | 0.046 |
| 73.50 | -20.29 | -1.32 | 0.00 | -74.07 | 0.00 | 74.07 | 1,473.96 | 736.98 | 1,624.57 | 802.32 | 2.43 | -0.33 | 0.054 |
| 74.00 | -20.17 | -1.32 | 0.00 | -73.41 | 0.00 | 73.41 | 1,471.41 | 735.71 | 1,616.97 | 798.56 | 2.46 | -0.33 | 0.054 |
| 74.50 | -20.06 | -1.32 | 0.00 | -72.75 | 0.00 | 72.75 | 1,468.85 | 734.43 | 1,609.36 | 794.80 | 2.50 | -0.33 | 0.054 |
| 75.00 | -19.95 | -1.31 | 0.00 | -72.09 | 0.00 | 72.09 | 1,466.28 | 733.14 | 1,601.77 | 791.05 | 2.53 | -0.34 | 0.053 |
| 75.50 | -19.83 | -1.31 | 0.00 | -71.43 | 0.00 | 71.43 | 1,463.70 | 731.85 | 1,594.18 | 787.30 | 2.57 | -0.34 | 0.053 |
| 76.00 | -19.72 | -1.31 | 0.00 | -70.78 | 0.00 | 70.78 | 1,461.11 | 730.55 | 1,586.59 | 783.56 | 2.60 | -0.34 | 0.053 |
| 76.50 | -19.61 | -1.31 | 0.00 | -70.12 | 0.00 | 70.12 | 1,458.51 | 729.25 | 1,579.01 | 779.81 | 2.64 | -0.34 | 0.053 |
| 77.00 | -19.50 | -1.31 | 0.00 | -69.47 | 0.00 | 69.47 | 1,455.89 | 727.95 | 1,571.44 | 776.07 | 2.67 | -0.35 | 0.052 |
| 77.50 | -19.39 | -1.30 | 0.00 | -68.81 | 0.00 | 68.81 | 1,453.27 | 726.64 | 1,563.87 | 772.34 | 2.71 | -0.35 | 0.052 |
| 78.00 | -19.27 | -1.30 | 0.00 | -68.16 | 0.00 | 68.16 | 1,450.64 | 725.32 | 1,556.31 | 768.60 | 2.75 | -0.35 | 0.052 |
| 78.50 | -19.16 | -1.30 | 0.00 | -67.51 | 0.00 | 67.51 | 1,447.99 | 724.00 | 1,548.75 | 764.87 | 2.78 | -0.35 | 0.051 |
| 79.00 | -19.05 | -1.30 | 0.00 | -66.86 | 0.00 | 66.86 | 1,445.34 | 722.67 | 1,541.20 | 761.14 | 2.82 | -0.36 | 0.051 |
| 79.50 | -18.94 | -1.29 | 0.00 | -66.22 | 0.00 | 66.22 | 1,442.68 | 721.34 | 1,533.65 | 757.41 | 2.86 | -0.36 | 0.051 |
| 80.00 | -18.83 | -1.29 | 0.00 | -65.57 | 0.00 | 65.57 | 1,440.00 | 720.00 | 1,526.12 | 753.69 | 2.90 | -0.36 | 0.050 |
| 80.50 | -18.72 | -1.29 | 0.00 | -64.93 | 0.00 | 64.93 | 1,437.32 | 718.66 | 1,518.59 | 749.97 | 2.94 | -0.37 | 0.050 |
| 81.00 | -18.61 | -1.28 | 0.00 | -64.28 | 0.00 | 64.28 | 1,434.62 | 717.31 | 1,511.06 | 746.26 | 2.97 | -0.37 | 0.050 |
| 81.50 | -18.49 | -1.28 | 0.00 | -63.64 | 0.00 | 63.64 | 1,431.91 | 715.96 | 1,503.54 | 742.54 | 3.01 | -0.37 | 0.049 |
| 82.00 | -18.38 | -1.28 | 0.00 | -63.00 | 0.00 | 63.00 | 1,429.20 | 714.60 | 1,496.03 | 738.83 | 3.05 | -0.37 | 0.049 |
| 82.50 | -18.27 | -1.28 | 0.00 | -62.36 | 0.00 | 62.36 | 1,426.47 | 713.23 | 1,488.53 | 735.13 | 3.09 | -0.38 | 0.049 |
| 83.00 | -18.16 | -1.27 | 0.00 | -61.72 | 0.00 | 61.72 | 1,423.73 | 711.87 | 1,481.03 | 731.43 | 3.13 | -0.38 | 0.048 |
| 83.50 | -18.05 | -1.27 | 0.00 | -61.09 | 0.00 | 61.09 | 1,420.98 | 710.49 | 1,473.54 | 727.73 | 3.17 | -0.38 | 0.048 |
| 84.00 | -17.94 | -1.27 | 0.00 | -60.45 | 0.00 | 60.45 | 1,418.23 | 709.11 | 1,466.06 | 724.03 | 3.21 | -0.38 | 0.048 |
| 84.50 | -17.83 | -1.26 | 0.00 | -59.82 | 0.00 | 59.82 | 1,415.46 | 707.73 | 1,458.58 | 720.34 | 3.25 | -0.39 | 0.047 |
| 85.00 | -17.72 | -1.26 | 0.00 | -59.19 | 0.00 | 59.19 | 1,412.68 | 706.34 | 1,451.11 | 716.65 | 3.29 | -0.39 | 0.047 |
| 85.50 | -17.61 | -1.26 | 0.00 | -58.56 | 0.00 | 58.56 | 1,409.89 | 704.94 | 1,443.65 | 712.97 | 3.33 | -0.39 | 0.047 |
| 86.00 | -17.50 | -1.25 | 0.00 | -57.93 | 0.00 | 57.93 | 1,407.09 | 703.54 | 1,436.20 | 709.28 | 3.37 | -0.39 | 0.046 |
| 86.50 | -17.39 | -1.25 | 0.00 | -57.30 | 0.00 | 57.30 | 1,404.28 | 702.14 | 1,428.75 | 705.61 | 3.41 | -0.40 | 0.046 |
| 87.00 | -17.28 | -1.25 | 0.00 | -56.67 | 0.00 | 56.67 | 1,401.46 | 700.73 | 1,421.32 | 701.93 | 3.46 | -0.40 | 0.046 |
| 87.50 | -17.17 | -1.24 | 0.00 | -56.05 | 0.00 | 56.05 | 1,398.63 | 699.31 | 1,413.89 | 698.26 | 3.50 | -0.40 | 0.045 |
| 88.00 | -17.06 | -1.24 | 0.00 | -55.43 | 0.00 | 55.43 | 1,395.79 | 697.89 | 1,406.46 | 694.60 | 3.54 | -0.40 | 0.045 |
| 88.50 | -16.96 | -1.24 | 0.00 | -54.81 | 0.00 | 54.81 | 1,392.93 | 696.47 | 1,399.05 | 690.94 | 3.58 | -0.41 | 0.045 |
| 89.00 | -16.85 | -1.23 | 0.00 | -54.19 | 0.00 | 54.19 | 1,390.07 | 695.04 | 1,391.64 | 687.28 | 3.63 | -0.41 | 0.044 |

Customer: SPRINT NEXTEL

| 89.50 | -16.74 | -1.23 | 0.00 | -53.57 | 0.00 | 53.57 | 1,387.20 | 693.60 | 1,384.25 | 683.63 | 3.67 | -0.41 | 0.044 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 90.00 | -16.63 | -1.23 | 0.00 | -52.96 | 0.00 | 52.96 | 1,384.32 | 692.16 | 1,376.86 | 679.98 | 3.71 | -0.41 | 0.044 |
| 90.50 | -16.52 | -1.22 | 0.00 | -52.35 | 0.00 | 52.35 | 1,381.42 | 690.71 | 1,369.48 | 676.33 | 3.75 | -0.42 | 0.043 |
| 91.00 | -16.41 | -1.22 | 0.00 | -51.73 | 0.00 | 51.73 | 1,378.52 | 689.26 | 1,362.10 | 672.69 | 3.80 | -0.42 | 0.043 |
| 91.50 | -16.30 | -1.22 | 0.00 | -51.13 | 0.00 | 51.13 | 1,375.61 | 687.80 | 1,354.74 | 669.06 | 3.84 | -0.42 | 0.043 |
| 92.00 | -16.20 | -1.21 | 0.00 | -50.52 | 0.00 | 50.52 | 1,372.68 | 686.34 | 1,347.39 | 665.42 | 3.89 | -0.42 | 0.042 |
| 92.50 | -16.09 | -1.21 | 0.00 | -49.91 | 0.00 | 49.91 | 1,369.75 | 684.87 | 1,340.04 | 661.80 | 3.93 | -0.43 | 0.042 |
| 93.00 | -15.98 | -1.20 | 0.00 | -49.31 | 0.00 | 49.31 | 1,366.80 | 683.40 | 1,332.70 | 658.17 | 3.98 | -0.43 | 0.041 |
| 93.50 | -15.87 | -1.20 | 0.00 | -48.71 | 0.00 | 48.71 | 1,363.85 | 681.92 | 1,325.38 | 654.55 | 4.02 | -0.43 | 0.041 |
| 94.00 | -15.76 | -1.20 | 0.00 | -48.11 | 0.00 | 48.11 | 1,360.88 | 680.44 | 1,318.06 | 650.94 | 4.07 | -0.43 | 0.041 |
| 94.50 | -15.66 | -1.19 | 0.00 | -47.51 | 0.00 | 47.51 | 1,357.90 | 678.95 | 1,310.75 | 647.33 | 4.11 | -0.44 | 0.040 |
| 95.00 | -15.55 | -1.19 | 0.00 | -46.91 | 0.00 | 46.91 | 1,354.92 | 677.46 | 1,303.45 | 643.72 | 4.16 | -0.44 | 0.040 |
| 95.50 | -15.44 | -1.18 | 0.00 | -46.32 | 0.00 | 46.32 | 1,351.92 | 675.96 | 1,296.16 | 640.12 | 4.20 | -0.44 | 0.040 |
| 96.00 | -15.34 | -1.18 | 0.00 | -45.73 | 0.00 | 45.73 | 1,348.91 | 674.46 | 1,288.88 | 636.53 | 4.25 | -0.44 | 0.039 |
| 96.50 | -15.23 | -1.18 | 0.00 | -45.14 | 0.00 | 45.14 | 1,345.89 | 672.95 | 1,281.61 | 632.94 | 4.30 | -0.45 | 0.039 |
| 97.00 | -15.12 | -1.17 | 0.00 | -44.55 | 0.00 | 44.55 | 1,342.86 | 671.43 | 1,274.35 | 629.35 | 4.34 | -0.45 | 0.039 |
| 97.50 | -15.02 | -1.17 | 0.00 | -43.96 | 0.00 | 43.96 | 1,339.82 | 669.91 | 1,267.09 | 625.77 | 4.39 | -0.45 | 0.038 |
| 98.00 | -14.91 | -1.16 | 0.00 | -43.38 | 0.00 | 43.38 | 1,336.78 | 668.39 | 1,259.85 | 622.19 | 4.44 | -0.45 | 0.038 |
| 98.50 | -14.80 | -1.16 | 0.00 | -42.80 | 0.00 | 42.80 | 1,333.72 | 666.86 | 1,252.62 | 618.62 | 4.49 | -0.45 | 0.038 |
| 99.00 | -14.70 | -1.15 | 0.00 | -42.22 | 0.00 | 42.22 | 1,330.65 | 665.32 | 1,245.40 | 615.06 | 4.53 | -0.46 | 0.037 |
| 99.50 | -14.59 | -1.15 | 0.00 | -41.64 | 0.00 | 41.64 | 1,327.57 | 663.78 | 1,238.19 | 611.50 | 4.58 | -0.46 | 0.037 |
| 100.00 | -14.48 | -1.14 | 0.00 | -41.07 | 0.00 | 41.07 | 1,324.47 | 662.24 | 1,230.99 | 607.94 | 4.63 | -0.46 | 0.037 |
| 100.50 | -14.38 | -1.14 | 0.00 | -40.50 | 0.00 | 40.50 | 1,321.37 | 660.69 | 1,223.80 | 604.39 | 4.68 | -0.46 | 0.036 |
| 101.00 | -14.27 | -1.14 | 0.00 | -39.93 | 0.00 | 39.93 | 1,318.26 | 659.13 | 1,216.62 | 600.84 | 4.73 | -0.47 | 0.036 |
| 101.50 | -14.17 | -1.13 | 0.00 | -39.36 | 0.00 | 39.36 | 1,315.14 | 657.57 | 1,209.45 | 597.30 | 4.78 | -0.47 | 0.036 |
| 102.00 | -14.06 | -1.13 | 0.00 | -38.79 | 0.00 | 38.79 | 1,312.01 | 656.00 | 1,202.30 | 593.77 | 4.83 | -0.47 | 0.035 |
| 102.50 | -13.96 | -1.12 | 0.00 | -38.23 | 0.00 | 38.23 | 1,308.86 | 654.43 | 1,195.15 | 590.24 | 4.87 | -0.47 | 0.035 |
| 103.00 | -13.85 | -1.12 | 0.00 | -37.67 | 0.00 | 37.67 | 1,305.71 | 652.86 | 1,188.02 | 586.72 | 4.92 | -0.48 | 0.034 |
| 103.50 | -13.75 | -1.11 | 0.00 | -37.11 | 0.00 | 37.11 | 1,302.55 | 651.27 | 1,180.89 | 583.20 | 4.97 | -0.48 | 0.034 |
| 104.00 | -13.64 | -1.11 | 0.00 | -36.56 | 0.00 | 36.56 | 1,299.37 | 649.69 | 1,173.78 | 579.69 | 5.02 | -0.48 | 0.034 |
| 104.50 | -13.54 | -1.10 | 0.00 | -36.00 | 0.00 | 36.00 | 1,296.19 | 648.09 | 1,166.68 | 576.18 | 5.07 | -0.48 | 0.033 |
| 105.00 | -13.43 | -1.10 | 0.00 | -35.45 | 0.00 | 35.45 | 1,292.99 | 646.50 | 1,159.59 | 572.68 | 5.13 | -0.48 | 0.033 |
| 105.50 | -13.33 | -1.09 | 0.00 | -34.91 | 0.00 | 34.91 | 1,288.98 | 644.49 | 1,151.78 | 568.82 | 5.18 | -0.49 | 0.033 |
| 106.00 | -13.22 | -1.09 | 0.00 | -34.36 | 0.00 | 34.36 | 1,284.33 | 642.16 | 1,143.44 | 564.70 | 5.23 | -0.49 | 0.032 |
| 106.50 | -13.12 | -1.08 | 0.00 | -33.82 | 0.00 | 33.82 | 1,279.68 | 639.84 | 1,135.13 | 560.60 | 5.28 | -0.49 | 0.032 |
| 107.00 | -13.01 | -1.08 | 0.00 | -33.28 | 0.00 | 33.28 | 1,275.03 | 637.51 | 1,126.85 | 556.51 | 5.33 | -0.49 | 0.032 |
| 107.50 | -12.91 | -1.07 | 0.00 | -32.74 | 0.00 | 32.74 | 1,270.38 | 635.19 | 1,118.60 | 552.44 | 5.38 | -0.49 | 0.031 |
| 108.00 | -12.81 | -1.07 | 0.00 | -32.20 | 0.00 | 32.20 | 1,265.73 | 632.87 | 1,110.38 | 548.38 | 5.43 | -0.50 | 0.031 |
| 108.50 | -12.70 | -1.06 | 0.00 | -31.67 | 0.00 | 31.67 | 1,261.08 | 630.54 | 1,102.19 | 544.33 | 5.49 | -0.50 | 0.031 |
| 109.00 | -12.60 | -1.05 | 0.00 | -31.14 | 0.00 | 31.14 | 1,256.43 | 628.22 | 1,094.04 | 540.30 | 5.54 | -0.50 | 0.030 |
| 109.50 | -12.50 | -1.05 | 0.00 | -30.61 | 0.00 | 30.61 | 1,251.78 | 625.89 | 1,085.91 | 536.29 | 5.59 | -0.50 | 0.030 |
| 110.00 | -12.41 | -1.04 | 0.00 | -30.09 | 0.00 | 30.09 | 1,247.14 | 623.57 | 1,077.81 | 532.29 | 5.64 | -0.50 | 0.030 |
| 110.00 | -12.41 | -1.04 | 0.00 | -30.09 | 0.00 | 30.09 | -253.24 | 426.62 | 741.79 | 366.34 | 5.64 | -0.50 | 0.000 |
| 110.50 | -12.32 | -1.04 | 0.00 | -29.57 | 0.00 | 29.57 | 851.46 | 425.73 | 737.46 | 364.21 | 5.70 | -0.51 | 0.041 |
| 111.00 | -12.24 | -1.04 | 0.00 | -29.05 | 0.00 | 29.05 | 849.67 | 424.84 | 733.15 | 362.07 | 5.75 | -0.51 | 0.041 |
| 111.50 | -12.15 | -1.03 | 0.00 | -28.53 | 0.00 | 28.53 | 847.87 | 423.94 | 728.83 | 359.94 | 5.80 | -0.51 | 0.040 |
| 112.00 | -12.06 | -1.03 | 0.00 | -28.01 | 0.00 | 28.01 | 846.07 | 423.03 | 724.52 | 357.81 | 5.86 | -0.51 | 0.040 |
| 112.50 | -11.98 | -1.02 | 0.00 | -27.50 | 0.00 | 27.50 | 844.25 | 422.12 | 720.21 | 355.68 | 5.91 | -0.52 | 0.039 |
| 113.00 | -11.89 | -1.02 | 0.00 | -26.99 | 0.00 | 26.99 | 842.42 | 421.21 | 715.90 | 353.56 | 5.96 | -0.52 | 0.039 |
| 113.50 | -11.81 | -1.01 | 0.00 | -26.48 | 0.00 | 26.48 | 840.58 | 420.29 | 711.60 | 351.43 | 6.02 | -0.52 | 0.038 |
| 114.00 | -11.72 | -1.01 | 0.00 | -25.98 | 0.00 | 25.98 | 838.73 | 419.36 | 707.30 | 349.31 | 6.07 | -0.52 | 0.038 |
| 114.50 | -11.64 | -1.00 | 0.00 | -25.47 | 0.00 | 25.47 | 836.87 | 418.43 | 703.00 | 347.19 | 6.13 | -0.53 | 0.037 |
| 115.00 | -11.55 | -1.00 | 0.00 | -24.97 | 0.00 | 24.97 | 834.99 | 417.50 | 698.71 | 345.06 | 6.18 | -0.53 | 0.036 |
| 115.50 | -11.46 | -0.99 | 0.00 | -24.47 | 0.00 | 24.47 | 833.11 | 416.56 | 694.42 | 342.95 | 6.24 | -0.53 | 0.036 |
| 116.00 | -11.38 | -0.99 | 0.00 | -23.98 | 0.00 | 23.98 | 831.22 | 415.61 | 690.13 | 340.83 | 6.30 | -0.53 | 0.035 |
| 116.50 | -11.33 | -0.98 | 0.00 | -23.48 | 0.00 | 23.48 | 829.32 | 414.66 | 685.85 | 338.71 | 6.35 | -0.53 | 0.035 |
| 116.50 | -11.33 | -0.98 | 0.00 | -23.48 | 0.00 | 23.48 | 829.32 | 414.66 | 685.85 | 338.71 | 6.35 | -0.53 | 0.083 |
| 117.00 | -11.27 | -0.98 | 0.00 | -22.99 | 0.00 | 22.99 | 827.41 | 413.70 | 681.57 | 336.60 | 6.41 | -0.54 | 0.082 |
| 117.50 | -11.22 | -0.98 | 0.00 | -22.50 | 0.00 | 22.50 | 825.48 | 412.74 | 677.29 | 334.49 | 6.46 | -0.54 | 0.081 |
| 118.00 | -11.16 | -0.98 | 0.00 | -22.01 | 0.00 | 22.01 | 823.55 | 411.77 | 673.02 | 332.38 | 6.52 | -0.55 | 0.080 |
| 118.50 | -11.11 | -0.97 | 0.00 | -21.52 | 0.00 | 21.52 | 821.61 | 410.80 | 668.75 | 330.27 | 6.58 | -0.55 | 0.079 |
| 119.00 | -11.06 | -0.97 | 0.00 | -21.03 | 0.00 | 21.03 | 819.65 | 409.83 | 664.49 | 328.17 | 6.64 | -0.56 | 0.078 |
| 119.50 | -11.01 | -0.97 | 0.00 | -20.55 | 0.00 | 20.55 | 817.69 | 408.84 | 660.23 | 326.06 | 6.70 | -0.56 | 0.076 |
| 120.00 | -10.95 | -0.97 | 0.00 | -20.06 | 0.00 | 20.06 | 815.71 | 407.86 | 655.98 | 323.96 | 6.75 | -0.57 | 0.075 |

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:38 PM
Customer: SPRINT NEXTEL

| 120.50 | -10.90 | -0.96 | 0.00 | -19.58 | 0.00 | 19.58 | 813.73 | 406.86 | 651.73 | 321.87 | 6.81 | -0.57 | 0.074 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 121.00 | -10.85 | -0.96 | 0.00 | -19.10 | 0.00 | 19.10 | 811.73 | 405.86 | 647.49 | 319.77 | 6.87 | -0.58 | 0.073 |
| 121.50 | -10.79 | -0.96 | 0.00 | -18.62 | 0.00 | 18.62 | 809.72 | 404.86 | 643.25 | 317.68 | 6.94 | -0.58 | 0.072 |
| 122.00 | -10.74 | -0.96 | 0.00 | -18.14 | 0.00 | 18.14 | 807.71 | 403.85 | 639.01 | 315.58 | 7.00 | -0.59 | 0.071 |
| 122.50 | -10.69 | -0.95 | 0.00 | -17.66 | 0.00 | 17.66 | 805.68 | 402.84 | 634.78 | 313.49 | 7.06 | -0.59 | 0.070 |
| 123.00 | -10.64 | -0.95 | 0.00 | -17.18 | 0.00 | 17.18 | 803.64 | 401.82 | 630.56 | 311.41 | 7.12 | -0.60 | 0.068 |
| 123.50 | -10.58 | -0.95 | 0.00 | -16.71 | 0.00 | 16.71 | 801.59 | 400.80 | 626.34 | 309.32 | 7.18 | -0.60 | 0.067 |
| 124.00 | -10.53 | -0.94 | 0.00 | -16.23 | 0.00 | 16.23 | 799.54 | 399.77 | 622.12 | 307.24 | 7.25 | -0.61 | 0.066 |
| 124.50 | -10.48 | -0.94 | 0.00 | -15.76 | 0.00 | 15.76 | 797.47 | 398.73 | 617.91 | 305.16 | 7.31 | -0.61 | 0.065 |
| 125.00 | -10.43 | -0.94 | 0.00 | -15.29 | 0.00 | 15.29 | 795.39 | 397.69 | 613.71 | 303.09 | 7.37 | -0.61 | 0.064 |
| 125.50 | -10.38 | -0.94 | 0.00 | -14.82 | 0.00 | 14.82 | 793.30 | 396.65 | 609.51 | 301.01 | 7.44 | -0.62 | 0.062 |
| 126.00 | -10.32 | -0.93 | 0.00 | -14.36 | 0.00 | 14.36 | 791.20 | 395.60 | 605.32 | 298.94 | 7.50 | -0.62 | 0.061 |
| 126.50 | -10.27 | -0.93 | 0.00 | -13.89 | 0.00 | 13.89 | 789.09 | 394.54 | 601.13 | 296.88 | 7.57 | -0.63 | 0.060 |
| 127.00 | -10.22 | -0.93 | 0.00 | -13.42 | 0.00 | 13.42 | 786.97 | 393.48 | 596.95 | 294.81 | 7.63 | -0.63 | 0.059 |
| 127.50 | -10.17 | -0.92 | 0.00 | -12.96 | 0.00 | 12.96 | 784.84 | 392.42 | 592.78 | 292.75 | 7.70 | -0.63 | 0.057 |
| $128.00$ | -10.12 | -0.92 | 0.00 | -12.50 | 0.00 | 12.50 | 782.69 | 391.35 | 588.61 | 290.69 | 7.77 | -0.64 | 0.056 |
| 128.50 | -10.07 | -0.92 | 0.00 | -12.04 | 0.00 | 12.04 | 780.54 | 390.27 | 584.44 | 288.64 | 7.83 | -0.64 | 0.055 |
| 129.00 | -10.02 | -0.91 | 0.00 | -11.58 | 0.00 | 11.58 | 778.38 | 389.19 | 580.29 | 286.58 | 7.90 | -0.65 | 0.053 |
| 129.50 | -9.96 | -0.91 | 0.00 | -11.13 | 0.00 | 11.13 | 776.21 | 388.10 | 576.14 | 284.53 | 7.97 | -0.65 | 0.052 |
| 130.00 | -9.91 | -0.91 | 0.00 | -10.67 | 0.00 | 10.67 | 774.02 | 387.01 | 572.00 | 282.49 | 8.04 | -0.65 | 0.051 |
| 130.50 | -9.86 | -0.90 | 0.00 | -10.22 | 0.00 | 10.22 | 771.83 | 385.91 | 567.86 | 280.44 | 8.11 | -0.66 | 0.049 |
| 131.00 | -5.87 | -0.58 | 0.00 | -9.77 | 0.00 | 9.77 | 769.63 | 384.81 | 563.73 | 278.40 | 8.18 | -0.66 | 0.043 |
| $131.50$ | $-5.83$ | -0.58 | 0.00 | -9.48 | 0.00 | 9.48 | 767.41 | 383.71 | 559.60 | 276.37 | 8.24 | -0.66 | 0.042 |
| 132.00 | -5.78 | -0.57 | 0.00 | -9.19 | 0.00 | 9.19 | 765.19 | 382.59 | 555.49 | 274.33 | 8.31 | -0.67 | 0.041 |
| 132.50 | -5.74 | -0.57 | 0.00 | -8.90 | 0.00 | 8.90 | 762.95 | 381.48 | 551.38 | 272.31 | 8.38 | -0.67 | 0.040 |
| 133.00 | -5.70 | -0.57 | 0.00 | -8.62 | 0.00 | 8.62 | 760.71 | 380.35 | 547.28 | 270.28 | 8.45 | -0.67 | 0.039 |
| 133.50 | -5.65 | -0.56 | 0.00 | -8.33 | 0.00 | 8.33 | 758.45 | 379.23 | 543.18 | 268.26 | 8.52 | -0.67 | 0.039 |
| $134.00$ | -5.61 | -0.56 | 0.00 | -8.05 | 0.00 | 8.05 | 756.18 | 378.09 | 539.09 | 266.24 | 8.60 | -0.68 | 0.038 |
| 134.50 | -5.57 | -0.56 | 0.00 | -7.77 | 0.00 | 7.77 | 753.91 | 376.95 | 535.01 | 264.22 | 8.67 | -0.68 | 0.037 |
| 135.00 | -5.53 | -0.55 | 0.00 | -7.49 | 0.00 | 7.49 | 751.62 | 375.81 | 530.94 | 262.21 | 8.74 | -0.68 | 0.036 |
| 135.50 | -5.48 | -0.55 | 0.00 | -7.21 | 0.00 | 7.21 | 749.32 | 374.66 | 526.87 | 260.20 | 8.81 | -0.69 | 0.035 |
| 136.00 | -5.44 | -0.55 | 0.00 | -6.94 | 0.00 | 6.94 | 747.01 | 373.51 | 522.82 | 258.20 | 8.88 | -0.69 | 0.034 |
| $136.50$ | -5.40 | -0.54 | 0.00 | -6.66 | 0.00 | 6.66 | 744.70 | 372.35 | 518.77 | 256.20 | 8.95 | -0.69 | 0.033 |
| $137.00$ | -5.36 | -0.54 | 0.00 | -6.39 | 0.00 | 6.39 | 742.37 | 371.18 | 514.72 | 254.20 | 9.03 | -0.69 | 0.032 |
| $137.50$ | -5.31 | -0.54 | 0.00 | -6.12 | 0.00 | 6.12 | 740.03 | 370.01 | 510.69 | 252.21 | 9.10 | -0.70 | 0.031 |
| 138.00 | -5.27 | -0.53 | 0.00 | -5.85 | 0.00 | 5.85 | 737.68 | 368.84 | 506.66 | 250.22 | 9.17 | -0.70 | 0.031 |
| 138.50 | -5.23 | -0.53 | 0.00 | -5.58 | 0.00 | 5.58 | 735.32 | 367.66 | 502.65 | 248.24 | 9.25 | -0.70 | 0.030 |
| 139.00 | -5.19 | -0.53 | 0.00 | -5.32 | 0.00 | 5.32 | 732.95 | 366.47 | 498.64 | 246.26 | 9.32 | -0.70 | 0.029 |
| $139.50$ | -5.15 | -0.52 | 0.00 | -5.06 | 0.00 | 5.06 | 730.57 | 365.28 | 494.64 | 244.28 | 9.39 | -0.70 | 0.028 |
| 140.00 | -5.10 | -0.52 | 0.00 | -4.79 | 0.00 | 4.79 | 728.18 | 364.09 | 490.64 | 242.31 | 9.47 | -0.71 | 0.027 |
| 140.50 | -5.06 | -0.52 | 0.00 | -4.53 | 0.00 | 4.53 | 725.44 | 362.72 | 486.44 | 240.23 | 9.54 | -0.71 | 0.026 |
| $141.00$ | -4.94 | -0.51 | 0.00 | -4.28 | 0.00 | 4.28 | 721.95 | 360.98 | 481.74 | 237.92 | 9.61 | -0.71 | 0.025 |
| $141.50$ | -4.90 | -0.50 | 0.00 | -4.02 | 0.00 | 4.02 | 718.47 | 359.23 | 477.08 | 235.61 | 9.69 | -0.71 | 0.024 |
| 142.00 | -4.86 | -0.50 | 0.00 | -3.77 | 0.00 | 3.77 | 714.98 | 357.49 | 472.43 | 233.32 | 9.76 | -0.71 | 0.023 |
| 142.50 | -4.83 | -0.49 | 0.00 | -3.52 | 0.00 | 3.52 | 711.49 | 355.75 | 467.81 | 231.03 | 9.84 | -0.72 | 0.022 |
| 143.00 | -4.79 | -0.49 | 0.00 | -3.28 | 0.00 | 3.28 | 708.01 | 354.00 | 463.21 | 228.76 | 9.91 | -0.72 | 0.021 |
| 143.50 | -4.75 | -0.49 | 0.00 | -3.03 | 0.00 | 3.03 | 704.52 | 352.26 | 458.63 | 226.50 | 9.99 | -0.72 | 0.020 |
| 144.00 | -4.71 | -0.48 | 0.00 | -2.79 | 0.00 | 2.79 | 701.03 | 350.52 | 454.07 | 224.25 | 10.06 | -0.72 | 0.019 |
| 144.50 | -4.67 | -0.48 | 0.00 | -2.54 | 0.00 | 2.54 | 697.55 | 348.77 | 449.54 | 222.01 | 10.14 | -0.72 | 0.018 |
| 145.00 | -4.64 | -0.48 | 0.00 | -2.30 | 0.00 | 2.30 | 694.06 | 347.03 | 445.03 | 219.78 | 10.21 | -0.72 | 0.017 |
| 145.50 | -4.60 | -0.47 | 0.00 | -2.07 | 0.00 | 2.07 | 690.57 | 345.29 | 440.55 | 217.57 | 10.29 | -0.72 | 0.016 |
| 146.00 | -4.56 | -0.47 | 0.00 | -1.83 | 0.00 | 1.83 | 687.09 | 343.54 | 436.08 | 215.36 | 10.37 | -0.72 | 0.015 |
| 146.50 | -4.52 | -0.47 | 0.00 | -1.59 | 0.00 | 1.59 | 683.60 | 341.80 | 431.64 | 213.17 | 10.44 | -0.72 | 0.014 |
| 147.00 | -4.49 | -0.46 | 0.00 | -1.36 | 0.00 | 1.36 | 680.11 | 340.06 | 427.22 | 210.99 | 10.52 | -0.73 | 0.013 |
| 147.50 | -4.45 | -0.46 | 0.00 | -1.13 | 0.00 | 1.13 | 676.63 | 338.31 | 422.83 | 208.82 | 10.59 | -0.73 | 0.012 |
| 148.00 | -4.41 -4.38 | -0.46 | 0.00 | -0.90 | 0.00 | 0.90 | 673.14 | 336.57 | 418.45 | 206.66 | 10.67 | -0.73 | 0.011 |
| 148.50 149.00 | -4.38 -4.34 | -0.45 -0.45 | 0.00 | -0.67 | 0.00 | 0.67 | 669.65 | 334.83 | 414.10 | 204.51 | 10.75 | -0.73 | 0.010 |
| 149.00 149.50 | -4.34 -4.30 | -0.45 -0.44 | 0.00 0.00 | -0.45 | 0.00 | 0.45 | 666.16 | 333.08 331.34 | 409.78 | 202.37 | 10.82 | -0.73 | 0.009 |
| 149.50 | -4.30 | -0.44 | 0.00 | -0.22 | 0.00 | 0.22 | 662.68 | 331.34 | 405.47 | 200.25 | 10.90 | -0.73 | 0.008 |
| 150.00 | 0.00 | -0.39 | 0.00 | 0.00 | 0.00 | 0.00 | 659.19 | 329.60 | 401.19 | 198.13 | 10.98 | -0.73 | 0.000 |

Customer: SPRINT NEXTEL

Load Case (0.9-0.2Sds) * DL + E EL.FM
Seismic (Reduced DL) Equivalent Lateral Forces Method Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{aligned} & \mathrm{Pu} \\ & \mathrm{FY}(-) \\ & \text { (kips) } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Vu } \\ & \text { FX }(-) \\ & \text { (kips) } \end{aligned}$ | $\begin{gathered} \text { Tu } \\ \text { MY } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MZ} \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | phi phi <br> Pn Vn <br> (kips) (kips) | phi phi <br> Tn Mn <br> (ft-kips) (ft-kips) | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -30.15 | -1.36 | 0.00 | -172.37 | 0.00 | 172.37 | 3,157.17 1,578.58 | 4,812.28 2,376.61 | 0.00 | 0.00 | 0.050 |
| 0.50 | -30.04 | -1.36 | 0.00 | -171.69 | 0.00 | 171.69 | 3,152.93 1,576.47 | 4,795.55 2,368.34 | 0.00 | 0.00 | 0.050 |
| 1.00 | -29.94 | -1.37 | 0.00 | -171.01 | 0.00 | 171.01 | 3,148.69 1,574.34 | 4,778.83 2,360.09 | 0.00 | 0.00 | 0.050 |
| 1.50 | -29.83 | -1.37 | 0.00 | -170.33 | 0.00 | 170.33 | 3,144.43 1,572.22 | 4,762.13 2,351.84 | 0.00 | -0.01 | 0.050 |
| 2.00 | -29.73 | -1.37 | 0.00 | -169.64 | 0.00 | 169.64 | 3,140.17 1,570.08 | 4,745.43 2,343.59 | 0.00 | -0.01 | 0.050 |
| 2.50 | -29.63 | -1.37 | 0.00 | -168.96 | 0.00 | 168.96 | 3,135.89 1,567.94 | 4,728.75 2,335.35 | 0.00 | -0.01 | 0.050 |
| 3.00 | -29.52 | -1.37 | 0.00 | -168.28 | 0.00 | 168.28 | 3,131.60 1,565.80 | 4,712.08 2,327.12 | 0.00 | -0.01 | 0.050 |
| 3.50 | -29.42 | -1.37 | 0.00 | -167.59 | 0.00 | 167.59 | 3,127.31 1,563.65 | 4,695.42 2,318.89 | 0.01 | -0.01 | 0.050 |
| 4.00 | -29.32 | -1.37 | 0.00 | -166.91 | 0.00 | 166.91 | 3,123.00 1,561.50 | 4,678.77 2,310.67 | 0.01 | -0.02 | 0.050 |
| 4.50 | -29.22 | -1.37 | 0.00 | -166.22 | 0.00 | 166.22 | 3,118.68 1,559.34 | 4,662.14 2,302.45 | 0.01 | -0.02 | 0.050 |
| 5.00 | -29.11 | -1.37 | 0.00 | -165.53 | 0.00 | 165.53 | 3,114.35 1,557.18 | 4,645.51 2,294.24 | 0.01 | -0.02 | 0.050 |
| 5.50 | -29.01 | -1.37 | 0.00 | -164.85 | 0.00 | 164.85 | 3,110.02 1,555.01 | 4,628.91 2,286.04 | 0.01 | -0.02 | 0.050 |
| 6.00 | -28.91 | -1.38 | 0.00 | -164.16 | 0.00 | 164.16 | 3,105.67 1,552.83 | 4,612.31 2,277.85 | 0.01 | -0.02 | 0.049 |
| 6.50 | -28.81 | -1.38 | 0.00 | -163.47 | 0.00 | 163.47 | 3,101.31 1,550.65 | 4,595.73 2,269.66 | 0.02 | -0.03 | 0.049 |
| 7.00 | -28.70 | -1.38 | 0.00 | -162.78 | 0.00 | 162.78 | 3,096.94 1,548.47 | 4,579.16 2,261.47 | 0.02 | -0.03 | 0.049 |
| 7.50 | -28.60 | -1.38 | 0.00 | -162.10 | 0.00 | 162.10 | 3,092.56 1,546.28 | 4,562.60 2,253.30 | 0.02 | -0.03 | 0.049 |
| 8.00 | -28.48 | -1.38 | 0.00 | -161.41 | 0.00 | 161.41 | 3,088.17 1,544.08 | 4,546.06 2,245.13 | 0.03 | -0.03 | 0.049 |
| 8.50 | -28.36 | -1.38 | 0.00 | -160.72 | 0.00 | 160.72 | 3,083.77 1,541.88 | 4,529.53 2,236.96 | 0.03 | -0.03 | 0.049 |
| 9.00 | -28.24 | -1.38 | 0.00 | -160.03 | 0.00 | 160.03 | 3,079.36 1,539.68 | 4,513.01 2,228.81 | 0.03 | -0.03 | 0.049 |
| 9.50 | -28.12 | -1.38 | 0.00 | -159.34 | 0.00 | 159.34 | 3,074.94 1,537.47 | 4,496.51 2,220.66 | 0.04 | -0.04 | 0.049 |
| 10.00 | -28.00 | -1.38 | 0.00 | -158.65 | 0.00 | 158.65 | 3,070.50 1,535.25 | 4,480.02 2,212.51 | 0.04 | -0.04 | 0.049 |
| 10.50 | -27.87 | -1.38 | 0.00 | -157.96 | 0.00 | 157.96 | 3,066.06 1,533.03 | 4,463.54 2,204.38 | 0.04 | -0.04 | 0.049 |
| 11.00 | -27.75 | -1.38 | 0.00 | -157.26 | 0.00 | 157.26 | 3,061.61 1,530.80 | 4,447.08 2,196.25 | 0.05 | -0.04 | 0.049 |
| 11.50 | -27.63 | -1.38 | 0.00 | -156.57 | 0.00 | 156.57 | 3,057.15 1,528.57 | 4,430.63 2,188.12 | 0.05 | -0.04 | 0.048 |
| 12.00 | -27.51 | -1.39 | 0.00 | -155.88 | 0.00 | 155.88 | 3,052.67 1,526.34 | 4,414.20 2,180.01 | 0.06 | -0.05 | 0.048 |
| 12.50 | -27.39 | -1.39 | 0.00 | -155.19 | 0.00 | 155.19 | 3,048.19 1,524.09 | 4,397.78 2,171.90 | 0.06 | -0.05 | 0.048 |
| 13.00 | -27.27 | -1.39 | 0.00 | -154.49 | 0.00 | 154.49 | 3,043.69 1,521.85 | 4,381.37 2,163.80 | 0.07 | -0.05 | 0.048 |
| 13.50 | -27.15 | -1.39 | 0.00 | -153.80 | 0.00 | 153.80 | 3,039.19 1,519.59 | 4,364.98 2,155.70 | 0.07 | -0.05 | 0.048 |
| 14.00 | -27.03 | -1.39 | 0.00 | -153.11 | 0.00 | 153.11 | 3,034.67 1,517.34 | 4,348.61 2,147.61 | 0.08 | -0.05 | 0.048 |
| 14.50 | -26.91 | -1.39 | 0.00 | -152.41 | 0.00 | 152.41 | 3,030.15 1,515.07 | 4,332.24 2,139.53 | 0.09 | -0.06 | 0.048 |
| 15.00 | -26.79 | -1.39 | 0.00 | -151.72 | 0.00 | 151.72 | 3,025.61 1,512.81 | 4,315.90 2,131.46 | 0.09 | -0.06 | 0.048 |
| 15.50 | -26.67 | -1.39 | 0.00 | -151.02 | 0.00 | 151.02 | 3,021.07 1,510.53 | 4,299.57 2,123.39 | 0.10 | -0.06 | 0.048 |
| 16.00 | -26.56 | -1.39 | 0.00 | -150.33 | 0.00 | 150.33 | 3,016.51 1,508.25 | 4,283.25 2,115.33 | 0.10 | -0.06 | 0.048 |
| 16.50 | -26.44 | -1.39 | 0.00 | -149.63 | 0.00 | 149.63 | 3,011.94 1,505.97 | 4,266.95 2,107.28 | 0.11 | -0.06 | 0.047 |
| 17.00 | -26.32 | -1.39 | 0.00 | -148.94 | 0.00 | 148.94 | 3,007.37 1,503.68 | 4,250.66 2,099.24 | 0.12 | -0.07 | 0.047 |
| 17.50 | -26.20 | -1.39 | 0.00 | -148.24 | 0.00 | 148.24 | 3,002.78 1,501.39 | 4,234.39 2,091.20 | 0.13 | -0.07 | 0.047 |
| 18.00 | -26.08 | -1.39 | 0.00 | -147.55 | 0.00 | 147.55 | 2,998.18 1,499.09 | 4,218.13 2,083.18 | 0.13 | -0.07 | 0.047 |
| 18.50 | -25.96 | -1.39 | 0.00 | -146.85 | 0.00 | 146.85 | 2,993.57 1,496.79 | 4,201.89 2,075.15 | 0.14 | -0.07 | 0.047 |
| 19.00 | -25.84 | -1.39 | 0.00 | -146.15 | 0.00 | 146.15 | 2,988.95 1,494.48 | 4,185.66 2,067.14 | 0.15 | -0.07 | 0.047 |
| 19.50 | -25.72 | -1.39 | 0.00 | -145.46 | 0.00 | 145.46 | 2,984.32 1,492.16 | 4,169.45 2,059.13 | 0.16 | -0.08 | 0.047 |
| 20.00 | -25.61 | -1.39 | 0.00 | -144.76 | 0.00 | 144.76 | 2,979.68 1,489.84 | 4,153.25 2,051.14 | 0.16 | -0.08 | 0.047 |
| 20.50 | -25.49 | -1.40 | 0.00 | -144.06 | 0.00 | 144.06 | 2,975.03 1,487.52 | 4,137.08 2,043.15 | 0.17 | -0.08 | 0.047 |
| 21.00 | -25.37 | -1.40 | 0.00 | -143.36 | 0.00 | 143.36 | 2,970.37 1,485.19 | 4,120.91 2,035.16 | 0.18 | -0.08 | 0.047 |
| 21.50 | -25.25 | -1.40 | 0.00 | -142.67 | 0.00 | 142.67 | 2,965.70 1,482.85 | 4,104.77 2,027.19 | 0.19 | -0.08 | 0.046 |
| 22.00 | -25.13 | -1.40 | 0.00 | -141.97 | 0.00 | 141.97 | 2,961.02 1,480.51 | 4,088.63 2,019.22 | 0.20 | -0.09 | 0.046 |
| 22.50 | -25.02 | -1.40 | 0.00 | -141.27 | 0.00 | 141.27 | 2,956.33 1,478.16 | 4,072.52 2,011.26 | 0.21 | -0.09 | 0.046 |
| 23.00 | -24.90 | -1.40 | 0.00 | -140.57 | 0.00 | 140.57 | 2,951.62 1,475.81 | 4,056.42 2,003.31 | 0.22 | -0.09 | 0.046 |
| 23.50 | -24.78 | -1.40 | 0.00 | -139.87 | 0.00 | 139.87 | 2,946.91 1,473.46 | 4,040.34 1,995.37 | 0.23 | -0.09 | 0.046 |
| 24.00 | -24.67 | -1.40 | 0.00 | -139.17 | 0.00 | 139.17 | 2,942.19 1,471.09 | 4,024.27 1,987.44 | 0.24 | -0.09 | 0.046 |
| 24.50 | -24.55 | -1.40 | 0.00 | -138.48 | 0.00 | 138.48 | 2,937.46 1,468.73 | 4,008.22 1,979.51 | 0.25 | -0.10 | 0.046 |
| 25.00 | -24.43 | -1.40 | 0.00 | -137.78 | 0.00 | 137.78 | 2,932.71 1,466.36 | 3,992.19 1,971.59 | 0.26 | -0.10 | 0.046 |
| 25.50 | -24.32 | -1.40 | 0.00 | -137.08 | 0.00 | 137.08 | 2,927.96 1,463.98 | 3,976.18 1,963.68 | 0.27 | -0.10 | 0.046 |
| 26.00 | -24.20 | -1.40 | 0.00 | -136.38 | 0.00 | 136.38 | 2,923.19 1,461.60 | 3,960.18 1,955.78 | 0.28 | -0.10 | 0.045 |
| 26.50 | -24.08 | -1.40 | 0.00 | -135.68 | 0.00 | 135.68 | 2,918.42 1,459.21 | 3,944.20 1,947.89 | 0.29 | -0.11 | 0.045 |
| 27.00 | -23.97 | -1.40 | 0.00 | -134.98 | 0.00 | 134.98 | 2,913.63 1,456.82 | 3,928.23 1,940.01 | 0.30 | -0.11 | 0.045 |
| 27.50 | -23.85 | -1.40 | 0.00 | -134.28 | 0.00 | 134.28 | 2,910.08 1,455.04 | 3,913.96 1,932.96 | 0.31 | -0.11 | 0.045 |

Customer: SPRINT NEXTEL

| 28.00 | -23.73 | -1.40 | 0.00 | -133.58 | 0.00 | 133.58 | 2,903.11 1,451.55 | 3,895.11 1,923.65 | 0.32 | -0.11 | 0.045 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 28.50 | -23.62 | -1.40 | 0.00 | -132.88 | 0.00 | 132.88 | 2,896.13 1,448.07 | 3,876.32 1,914.37 | 0.34 | -0.11 | 0.045 |
| 29.00 | -23.50 | -1.40 | 0.00 | -132.18 | 0.00 | 132.18 | 2,889.16 1,444.58 | 3,857.57 1,905.11 | 0.35 | -0.12 | 0.045 |
| 29.50 | -23.39 | -1.40 | 0.00 | -131.48 | 0.00 | 131.48 | 2,882.19 1,441.09 | 3,838.86 1,895.87 | 0.36 | -0.12 | 0.045 |
| 30.00 | -23.27 | -1.40 | 0.00 | -130.78 | 0.00 | 130.78 | 2,875.21 1,437.61 | 3,820.20 1,886.65 | 0.37 | -0.12 | 0.045 |
| 30.50 | -23.16 | -1.40 | 0.00 | -130.08 | 0.00 | 130.08 | 2,868.24 1,434.12 | 3,801.59 1,877.46 | 0.38 | -0.12 | 0.045 |
| 31.00 | -23.04 | -1.40 | 0.00 | -129.38 | 0.00 | 129.38 | 2,861.26 1,430.63 | 3,783.02 1,868.29 | 0.40 | -0.12 | 0.045 |
| 31.50 | -22.88 | -1.40 | 0.00 | -128.68 | 0.00 | 128.68 | 2,854.29 1,427.15 | 3,764.50 1,859.14 | 0.41 | -0.13 | 0.044 |
| 32.00 | -22.72 | -1.40 | 0.00 | -127.98 | 0.00 | 127.98 | 2,847.32 1,423.66 | 3,746.02 1,850.02 | 0.42 | -0.13 | 0.044 |
| 32.50 | -22.55 | -1.40 | 0.00 | -127.28 | 0.00 | 127.28 | 2,840.34 1,420.17 | 3,727.58 1,840.91 | 0.44 | -0.13 | 0.044 |
| 33.00 | -22.39 | -1.40 | 0.00 | -126.59 | 0.00 | 126.59 | 2,833.37 1,416.69 | 3,709.20 1,831.83 | 0.45 | -0.13 | 0.044 |
| 33.50 | -22.23 | -1.40 | 0.00 | -125.89 | 0.00 | 125.89 | 2,826.40 1,413.20 | 3,690.85 1,822.77 | 0.46 | -0.13 | 0.043 |
| 34.00 | -22.07 | -1.40 | 0.00 | -125.19 | 0.00 | 125.19 | 2,819.42 1,409.71 | 3,672.56 1,813.74 | 0.48 | -0.14 | 0.043 |
| 34.50 | $-21.90$ | -1.39 | 0.00 | -124.49 | 0.00 | 124.49 | 2,812.45 1,406.22 | 3,654.31 1,804.72 | 0.49 | -0.14 | 0.043 |
| 35.00 | -21.74 | -1.39 | 0.00 | -123.79 | 0.00 | 123.79 | 2,805.48 1,402.74 | 3,636.10 1,795.73 | 0.51 | -0.14 | 0.043 |
| 35.50 | -21.69 | -1.39 | 0.00 | -123.10 | 0.00 | 123.10 | 2,798.50 1,399.25 | 3,617.94 1,786.76 | 0.52 | -0.14 | 0.043 |
| 35.67 | -21.62 | -1.39 | 0.00 | -122.86 | 0.00 | 122.86 | 2,248.07 1,124.03 | 2,973.91 1,468.70 | 0.53 | -0.14 | 0.050 |
| 36.00 | -21.51 | -1.39 | 0.00 | -122.40 | 0.00 | 122.40 | 2,245.83 1,122.91 | 2,966.06 1,464.83 | 0.54 | -0.14 | 0.049 |
| 36.50 | -21.48 | -1.39 | 0.00 | -121.70 | 0.00 | 121.70 | 2,242.46 1,121.23 | 2,954.30 1,459.02 | 0.55 | -0.15 | 0.049 |
| 36.67 | -21.41 | -1.39 | 0.00 | -121.47 | 0.00 | 121.47 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.56 | -0.15 | 0.049 |
| 36.67 | -21.41 | -1.39 | 0.00 | -121.47 | 0.00 | 121.47 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.56 | -0.15 | 0.053 |
| 37.00 | -21.31 | -1.39 | 0.00 | -121.01 | 0.00 | 121.01 | 2,239.08 1,119.54 | 2,942.55 1,453.22 | 0.57 | -0.15 | 0.053 |
| 37.50 | -21.21 | -1.39 | 0.00 | -120.31 | 0.00 | 120.31 | 2,235.69 1,117.84 | 2,930.81 1,447.42 | 0.58 | -0.15 | 0.053 |
| 38.00 | -21.11 | -1.39 | 0.00 | -119.61 | 0.00 | 119.61 | 2,232.29 1,116.14 | 2,919.08 1,441.62 | 0.60 | -0.15 | 0.052 |
| 38.50 | -21.01 | -1.39 | 0.00 | -118.92 | 0.00 | 118.92 | 2,228.88 1,114.44 | 2,907.36 1,435.83 | 0.62 | -0.16 | 0.052 |
| 39.00 | -20.91 | -1.39 | 0.00 | -118.22 | 0.00 | 118.22 | 2,225.46 1,112.73 | 2,895.64 1,430.05 | 0.63 | -0.16 | 0.052 |
| 39.50 | -20.82 | -1.39 | 0.00 | -117.53 | 0.00 | 117.53 | 2,222.03 1,111.01 | 2,883.93 1,424.27 | 0.65 | -0.16 | 0.052 |
| 40.00 | -20.72 | -1.39 | 0.00 | -116.83 | 0.00 | 116.83 | 2,218.59 1,109.29 | 2,872.23 1,418.49 | 0.67 | -0.16 | 0.052 |
| 40.50 | -20.62 | -1.39 | 0.00 | -116.13 | 0.00 | 116.13 | 2,215.14 1,107.57 | 2,860.55 1,412.72 | 0.68 | -0.16 | 0.052 |
| 41.00 | -20.52 | -1.39 | 0.00 | -115.44 | 0.00 | 115.44 | 2,211.67 1,105.84 | 2,848.87 1,406.95 | 0.70 | -0.17 | 0.051 |
| 41.50 | -20.42 | -1.39 | 0.00 | -114.74 | 0.00 | 114.74 | 2,208.20 1,104.10 | 2,837.20 1,401.18 | 0.72 | -0.17 | 0.051 |
| 42.00 | -20.32 | -1.39 | 0.00 | -114.05 | 0.00 | 114.05 | 2,204.72 1,102.36 | 2,825.53 1,395.43 | 0.74 | -0.17 | 0.051 |
| 42.50 | -20.22 | -1.39 | 0.00 | -113.35 | 0.00 | 113.35 | 2,201.23 1,100.61 | 2,813.88 1,389.67 | 0.75 | -0.17 | 0.051 |
| 43.00 | -20.12 | -1.39 | 0.00 | -112.66 | 0.00 | 112.66 | 2,197.72 1,098.86 | 2,802.24 1,383.92 | 0.77 | -0.18 | 0.051 |
| 43.50 | -20.03 | -1.39 | 0.00 | -111.96 | 0.00 | 111.96 | 2,194.21 1,097.10 | 2,790.61 1,378.18 | 0.79 | -0.18 | 0.051 |
| 44.00 | -19.93 | -1.39 | 0.00 | -111.27 | 0.00 | 111.27 | 2,190.68 1,095.34 | 2,778.98 1,372.44 | 0.81 | -0.18 | 0.050 |
| 44.50 | -19.83 | -1.39 | 0.00 | -110.58 | 0.00 | 110.58 | 2,187.15 1,093.57 | 2,767.37 1,366.70 | 0.83 | -0.18 | 0.050 |
| 45.00 | -19.73 | -1.39 | 0.00 | -109.88 | 0.00 | 109.88 | 2,183.60 1,091.80 | 2,755.77 1,360.97 | 0.85 | -0.19 | 0.050 |
| 45.50 | -19.63 | -1.39 | 0.00 | -109.19 | 0.00 | 109.19 | 2,180.05 1,090.02 | 2,744.17 1,355.24 | 0.87 | -0.19 | 0.050 |
| 46.00 | -19.54 | -1.38 | 0.00 | -108.50 | 0.00 | 108.50 | 2,176.48 1,088.24 | 2,732.59 1,349.52 | 0.89 | -0.19 | 0.050 |
| 46.50 | -19.44 | -1.38 | 0.00 | -107.81 | 0.00 | 107.81 | 2,172.91 1,086.45 | 2,721.02 1,343.81 | 0.91 | -0.19 | 0.050 |
| 47.00 | -19.34 | -1.38 | 0.00 | -107.11 | 0.00 | 107.11 | 2,169.32 1,084.66 | 2,709.45 1,338.10 | 0.93 | -0.20 | 0.049 |
| 47.50 | -19.24 | -1.38 | 0.00 | -106.42 | 0.00 | 106.42 | 2,165.72 1,082.86 | 2,697.90 1,332.39 | 0.95 | -0.20 | 0.049 |
| 48.00 | -19.15 | -1.38 | 0.00 | -105.73 | 0.00 | 105.73 | 2,162.11 1,081.06 | 2,686.36 1,326.69 | 0.97 | -0.20 | 0.049 |
| 48.50 | -19.05 | -1.38 | 0.00 | -105.04 | 0.00 | 105.04 | 2,158.50 1,079.25 | 2,674.83 1,321.00 | 0.99 | -0.20 | 0.049 |
| 49.00 | -18.95 | -1.38 | 0.00 | -104.35 | 0.00 | 104.35 | 2,154.87 1,077.43 | 2,663.31 1,315.31 | 1.01 | -0.20 | 0.049 |
| 49.50 | -18.86 | -1.38 | 0.00 | -103.66 | 0.00 | 103.66 | 2,151.23 1,075.61 | 2,651.80 1,309.62 | 1.03 | -0.21 | 0.049 |
| 50.00 | -18.76 | -1.38 | 0.00 | -102.97 | 0.00 | 102.97 | 2,147.58 1,073.79 | 2,640.30 1,303.95 | 1.06 | -0.21 | 0.048 |
| 50.50 | -18.66 | -1.38 | 0.00 | -102.28 | 0.00 | 102.28 | 2,143.92 1,071.96 | 2,628.81 1,298.27 | 1.08 | -0.21 | 0.048 |
| 51.00 | -18.57 | -1.38 | 0.00 | -101.59 | 0.00 | 101.59 | 2,140.25 1,070.13 | 2,617.34 1,292.60 | 1.10 | -0.21 | 0.048 |
| 51.50 | -18.47 | -1.37 | 0.00 | -100.91 | 0.00 | 100.91 | 2,136.57 1,068.29 | 2,605.87 1,286.94 | 1.12 | -0.22 | 0.048 |
| 52.00 | -18.37 | -1.37 | 0.00 | -100.22 | 0.00 | 100.22 | 2,132.88 1,066.44 | 2,594.42 1,281.29 | 1.15 | -0.22 | 0.048 |
| 52.50 | -18.28 | -1.37 | 0.00 | -99.53 | 0.00 | 99.53 | 2,129.18 1,064.59 | 2,582.98 1,275.64 | 1.17 | -0.22 | 0.047 |
| 53.00 | -18.18 | -1.37 | 0.00 | -98.85 | 0.00 | 98.85 | 2,125.47 1,062.73 | 2,571.55 1,269.99 | 1.19 | -0.22 | 0.047 |
| 53.50 | -18.09 | -1.37 | 0.00 | -98.16 | 0.00 | 98.16 | 2,121.75 1,060.87 | 2,560.13 1,264.35 | 1.21 | -0.23 | 0.047 |
| 54.00 | -17.99 | -1.37 | 0.00 | -97.47 | 0.00 | 97.47 | 2,118.01 1,059.01 | 2,548.72 1,258.72 | 1.24 | -0.23 | 0.047 |
| 54.50 | -17.89 | -1.37 | 0.00 | -96.79 | 0.00 | 96.79 | 2,114.27 1,057.14 | 2,537.32 1,253.09 | 1.26 | -0.23 | 0.047 |
| 55.00 | -17.80 | -1.37 | 0.00 | -96.11 | 0.00 | 96.11 | 2,110.52 1,055.26 | 2,525.94 1,247.47 | 1.29 | -0.23 | 0.046 |
| 55.50 | -17.70 | -1.36 | 0.00 | -95.42 | 0.00 | 95.42 | 2,106.75 1,053.38 | 2,514.57 1,241.85 | 1.31 | -0.23 | 0.046 |
| 56.00 | -17.61 | -1.36 | 0.00 | -94.74 | 0.00 | 94.74 | 2,102.98 1,051.49 | 2,503.21 1,236.24 | 1.34 | -0.24 | 0.046 |
| 56.50 | -17.51 | -1.36 | 0.00 | -94.06 | 0.00 | 94.06 | 2,099.20 1,049.60 | 2,491.86 1,230.64 | 1.36 | -0.24 | 0.046 |
| 57.00 | -17.42 | -1.36 | 0.00 | -93.38 | 0.00 | 93.38 | 2,095.40 1,047.70 | 2,480.53 1,225.04 | 1.39 | -0.24 | 0.046 |
| 57.50 | -17.32 | -1.36 | 0.00 | -92.70 | 0.00 | 92.70 | 2,091.60 1,045.80 | 2,469.21 1,219.45 | 1.41 | -0.24 | 0.046 |
| 58.00 | -17.23 | -1.36 | 0.00 | -92.02 | 0.00 | 92.02 | 2,087.78 1,043.89 | 2,457.90 1,213.86 | 1.44 | -0.25 | 0.045 |





Customer: SPRINT NEXTEL

|  |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |


| Site Number: | 302494 | Code: ANSI/TIA-222-G C2007-2018 by ATC IP LLC. All rights reserved.  <br> Engineering Number: OAA712589_C3_05 $4 / 24 / 20185: 54: 38$ PM |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Site Name: | Hddm - Haddam, CT |  |  |  |
| Customer: | SPRINT NEXTEL |  |  |  |

## Equivalent Modal Forces Analysis

(Based on ASCE7-10 Chapters 11, 12 \& 15 and ANSI/TIA-G, section 2.7)


Load Case (1.2+0.2Sds) *DL + E EMAM Seismic Equivalent Modal Analysis Method

| Height |  |
| :---: | :---: |
| Above |  |
| Base | Weight |

Segment
(Ib)
a
b
C
Saz
Horizontal
Force
(lb)

Vertical
Force (lb)

| 303 | 149.75 | 30 | 1.884 | 1.947 | 1.128 | 0.350 | 9 | 37 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 302 | 149.25 | 30 | 1.871 | 1.882 | 1.105 | 0.342 | 9 | 37 |
| 301 | 148.75 | 30 | 1.859 | 1.819 | 1.081 | 0.334 | 9 | 37 |
| 300 | 148.25 | 30 | 1.846 | 1.757 | 1.059 | 0.326 | 8 | 37 |
| 299 | 147.75 | 30 | 1.834 | 1.696 | 1.036 | 0.319 | 8 | 37 |
| 298 | 147.25 | 30 | 1.821 | 1.637 | 1.014 | 0.311 | 8 | 37 |
| 297 | 146.75 | 30 | 1.809 | 1.580 | 0.993 | 0.303 | 8 | 37 |
| 296 | 146.25 | 30 | 1.797 | 1.523 | 0.972 | 0.296 | 8 | 38 |
| 295 | 145.75 | 30 | 1.784 | 1.469 | 0.951 | 0.289 | 8 | 38 |
| 294 | 145.25 | 31 | 1.772 | 1.415 | 0.930 | 0.282 | 7 | 38 |
| 293 | 144.75 | 31 | 1.760 | 1.363 | 0.910 | 0.274 | 7 | 38 |
| 292 | 144.25 | 31 | 1.748 | 1.312 | 0.890 | 0.267 | 7 | 38 |
| 291 | 143.75 | 31 | 1.736 | 1.263 | 0.871 | 0.260 | 7 | 38 |
| 290 | 143.25 | 31 | 1.724 | 1.214 | 0.851 | 0.253 | 7 | 38 |
| 289 | 142.75 | 31 | 1.712 | 1.167 | 0.833 | 0.247 | 7 | 38 |
| 288 | 142.25 | 31 | 1.700 | 1.121 | 0.814 | 0.240 | 6 | 38 |
| 287 | 141.75 | 31 | 1.688 | 1.077 | 0.796 | 0.233 | 6 | 38 |
| 286 | 141.25 | 31 | 1.676 | 1.033 | 0.778 | 0.226 | 6 | 39 |
| 285 | 140.75 | 34 | 1.664 | 0.991 | 0.761 | 0.220 | 6 | 42 |
| 284 | 140.25 | 34 | 1.652 | 0.950 | 0.743 | 0.214 | 6 | 42 |
| 283 | 139.75 | 34 | 1.641 | 0.909 | 0.726 | 0.207 | 6 | 42 |
| 282 | 139.25 | 34 | 1.629 | 0.870 | 0.710 | 0.201 | 6 | 42 |
| 281 | 138.75 | 34 | 1.617 | 0.832 | 0.694 | 0.195 | 6 | 42 |
| 280 | 138.25 | 34 | 1.605 | 0.796 | 0.678 | 0.189 | 6 | 42 |
| 279 | 137.75 | 34 | 1.594 | 0.760 | 0.662 | 0.183 | 5 | 42 |
| 278 | 137.25 | 34 | 1.582 | 0.725 | 0.646 | 0.177 | 5 | 42 |
| 277 | 136.75 | 34 | 1.571 | 0.691 | 0.631 | 0.171 | 5 | 43 |
| 276 | 136.25 | 34 | 1.559 | 0.658 | 0.616 | 0.165 | 5 | 43 |
| 275 | 135.75 | 35 | 1.548 | 0.626 | 0.602 | 0.159 | 5 | 43 |
| 274 | 135.25 | 35 | 1.537 | 0.595 | 0.587 | 0.153 | 5 | 43 |
| 273 | 134.75 | 35 | 1.525 | 0.565 | 0.573 | 0.148 | 4 | 43 |
| 272 | 134.25 | 35 | 1.514 | 0.536 | 0.560 | 0.142 | 4 | 43 |
| 271 | 133.75 | 35 | 1.503 | 0.508 | 0.546 | 0.137 | 4 | 43 |
| 270 | 133.25 | 35 | 1.491 | 0.480 | 0.533 | 0.132 | 4 | 43 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |  |
| :--- | :--- | ---: | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:38 PM |
| Customer: | SPRINT NEXTEL |  |  |  |


| 269 | 132.75 | 35 | 1.480 | 0.454 | 0.520 | 0.126 | 4 | 43 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 268 | 132.25 | 35 | 1.469 | 0.428 | 0.507 | 0.121 | 4 | 43 |
| 267 | 131.75 | 35 | 1.458 | 0.403 | 0.494 | 0.116 | 4 | 44 |
| 266 | 131.25 | 35 | 1.447 | 0.379 | 0.482 | 0.111 | 3 | 44 |
| 265 | 130.75 | 41 | 1.436 | 0.356 | 0.470 | 0.106 | 4 | 51 |
| 264 | 130.25 | 41 | 1.425 | 0.333 | 0.458 | 0.101 | 4 | 51 |
| 263 | 129.75 | 41 | 1.414 | 0.311 | 0.447 | 0.096 | 3 | 51 |
| 262 | 129.25 | 41 | 1.403 | 0.290 | 0.435 | 0.092 | 3 | 51 |
| 261 | 128.75 | 41 | 1.392 | 0.270 | 0.424 | 0.087 | 3 | 51 |
| 260 | 128.25 | 42 | 1.382 | 0.250 | 0.413 | 0.083 | 3 | 51 |
| 259 | 127.75 | 42 | 1.371 | 0.231 | 0.402 | 0.078 | 3 | 51 |
| 258 | 127.25 | 42 | 1.360 | 0.213 | 0.392 | 0.074 | 3 | 52 |
| 257 | 126.75 | 42 | 1.350 | 0.195 | 0.382 | 0.069 | 3 | 52 |
| 256 | 126.25 | 42 | 1.339 | 0.178 | 0.372 | 0.065 | 2 | 52 |
| 255 | 125.75 | 42 | 1.328 | 0.162 | 0.362 | 0.061 | 2 | 52 |
| 254 | 125.25 | 42 | 1.318 | 0.146 | 0.352 | 0.057 | 2 | 52 |
| 253 | 124.75 | 42 | 1.307 | 0.131 | 0.343 | 0.053 | 2 | 52 |
| 252 | 124.25 | 42 | 1.297 | 0.116 | 0.333 | 0.049 | 2 | 52 |
| 251 | 123.75 | 42 | 1.286 | 0.102 | 0.324 | 0.045 | 2 | 52 |
| 250 | 123.25 | 42 | 1.276 | 0.089 | 0.315 | 0.041 | 2 | 52 |
| 249 | 122.75 | 42 | 1.266 | 0.076 | 0.307 | 0.037 | 1 | 52 |
| 248 | 122.25 | 42 | 1.255 | 0.063 | 0.298 | 0.033 | 1 | 53 |
| 247 | 121.75 | 43 | 1.245 | 0.052 | 0.290 | 0.030 | 1 | 53 |
| 246 | 121.25 | 43 | 1.235 | 0.040 | 0.282 | 0.026 | 1 | 53 |
| 245 | 120.75 | 43 | 1.225 | 0.029 | 0.274 | 0.023 | 1 | 53 |
| 244 | 120.25 | 43 | 1.215 | 0.019 | 0.266 | 0.020 | 1 | 53 |
| 243 | 119.75 | 43 | 1.205 | 0.009 | 0.258 | 0.016 | 1 | 53 |
| 242 | 119.25 | 43 | 1.195 | 0.000 | 0.251 | 0.013 | 0 | 53 |
| 241 | 118.75 | 43 | 1.185 | -0.009 | 0.243 | 0.010 | 0 | 53 |
| 240 | 118.25 | 43 | 1.175 | -0.018 | 0.236 | 0.007 | 0 | 53 |
| 239 | 117.75 | 43 | 1.165 | -0.026 | 0.229 | 0.004 | 0 | 53 |
| 238 | 117.25 | 43 | 1.155 | -0.034 | 0.222 | 0.001 | 0 | 54 |
| 237 | 116.75 | 43 | 1.145 | -0.041 | 0.216 | -0.002 | 0 | 54 |
| 236 | 116.25 | 69 | 1.135 | -0.048 | 0.209 | -0.005 | 0 | 85 |
| 235 | 115.75 | 69 | 1.125 | -0.054 | 0.203 | -0.008 | 0 | 85 |
| 234 | 115.25 | 69 | 1.116 | -0.061 | 0.197 | -0.010 | -1 | 86 |
| 233 | 114.75 | 69 | 1.106 | -0.066 | 0.191 | -0.013 | -1 | 86 |
| 232 | 114.25 | 69 | 1.096 | -0.072 | 0.185 | -0.015 | -1 | 86 |
| 231 | 113.75 | 69 | 1.087 | -0.077 | 0.179 | -0.018 | -1 | 86 |
| 230 | 113.25 | 69 | 1.077 | -0.082 | 0.173 | -0.020 | -1 | 86 |
| 229 | 112.75 | 70 | 1.068 | -0.086 | 0.168 | -0.022 | -1 | 86 |
| 228 | 112.25 | 70 | 1.058 | -0.090 | 0.162 | -0.025 | -1 | 86 |
| 227 | 111.75 | 70 | 1.049 | -0.094 | 0.157 | -0.027 | -2 | 86 |
| 226 | 111.25 | 70 | 1.040 | -0.098 | 0.152 | -0.029 | -2 | 86 |
| 225 | 110.75 | 70 | 1.030 | -0.101 | 0.147 | -0.031 | -2 | 86 |
| 224 | 110.25 | 70 | 1.021 | -0.104 | 0.142 | -0.033 | -2 | 87 |
| 223 | 109.75 | 84 | 1.012 | -0.107 | 0.137 | -0.034 | -2 | 103 |
| 222 | 109.25 | 84 | 1.003 | -0.109 | 0.133 | -0.036 | -3 | 104 |
| 221 | 108.75 | 84 | 0.993 | -0.111 | 0.128 | -0.038 | -3 | 104 |
| 220 | 108.25 | 84 | 0.984 | -0.113 | 0.124 | -0.040 | -3 | 104 |
| 219 | 107.75 | 84 | 0.975 | -0.115 | 0.119 | -0.041 | -3 | 104 |
| 218 | 107.25 | 84 | 0.966 | -0.117 | 0.115 | -0.043 | -3 | 104 |
| 217 | 106.75 | 84 | 0.957 | -0.118 | 0.111 | -0.044 | -3 | 104 |
| 216 | 106.25 | 84 | 0.948 | -0.119 | 0.107 | -0.045 | -3 | 104 |
| 215 | 105.75 | 84 | 0.939 | -0.120 | 0.103 | -0.047 | -3 | 105 |
| 214 | 105.25 | 85 | 0.931 | -0.121 | 0.100 | -0.048 | -3 | 105 |
| 213 | 104.75 | 85 | 0.922 | -0.121 | 0.096 | -0.049 | -4 | 105 |
| 212 | 104.25 | 85 | 0.913 | -0.122 | 0.092 | -0.050 | -4 | 105 |
| 211 | 103.75 | 85 | 0.904 | -0.122 | 0.089 | -0.051 | -4 | 105 |
| 210 | 103.25 | 85 | 0.895 | -0.122 | 0.086 | -0.052 | -4 | 105 |
| 209 | 102.75 | 85 | 0.887 | -0.122 | 0.082 | -0.052 | -4 | 105 |
| 208 | 102.25 | 85 | 0.878 | -0.121 | 0.079 | -0.053 | -4 | 105 |
| 207 | 101.75 | 85 | 0.870 | -0.121 | 0.076 | -0.054 | -4 | 106 |
| 206 | 101.25 | 85 | 0.861 | -0.120 | 0.073 | -0.054 | -4 | 106 |


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| :---: | :---: | :---: | :---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | 4/24/2018 5:54:38 PM |

Customer: SPRINT NEXTEL

| 205 | 100.75 | 86 | 0.853 | -0.119 | 0.070 | -0.055 | -4 | 106 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 204 | 100.25 | 86 | 0.844 | -0.119 | 0.067 | -0.055 | -4 | 106 |
| 203 | 99.75 | 86 | 0.836 | -0.118 | 0.065 | -0.056 | -4 | 106 |
| 202 | 99.25 | 86 | 0.827 | -0.116 | 0.062 | -0.056 | -4 | 106 |
| 201 | 98.75 | 86 | 0.819 | -0.115 | 0.059 | -0.056 | -4 | 106 |
| 200 | 98.25 | 86 | 0.811 | -0.114 | 0.057 | -0.056 | -4 | 107 |
| 199 | 97.75 | 86 | 0.803 | -0.112 | 0.055 | -0.056 | -4 | 107 |
| 198 | 97.25 | 86 | 0.794 | -0.111 | 0.052 | -0.056 | -4 | 107 |
| 197 | 96.75 | 86 | 0.786 | -0.109 | 0.050 | -0.056 | -4 | 107 |
| 196 | 96.25 | 86 | 0.778 | -0.108 | 0.048 | -0.056 | -4 | 107 |
| 195 | 95.75 | 87 | 0.770 | -0.106 | 0.046 | -0.055 | -4 | 107 |
| 194 | 95.25 | 87 | 0.762 | -0.104 | 0.044 | -0.055 | -4 | 107 |
| 193 | 94.75 | 87 | 0.754 | -0.102 | 0.042 | -0.055 | -4 | 107 |
| 192 | 94.25 | 87 | 0.746 | -0.100 | 0.040 | -0.054 | -4 | 108 |
| 191 | 93.75 | 87 | 0.738 | -0.098 | 0.038 | -0.054 | -4 | 108 |
| 190 | 93.25 | 87 | 0.730 | $-0.096$ | 0.036 | -0.053 | -4 | 108 |
| 189 | 92.75 | 87 | 0.723 | -0.094 | 0.034 | -0.052 | -4 | 108 |
| 188 | 92.25 | 87 | 0.715 | -0.091 | 0.033 | -0.051 | -4 | 108 |
| 187 | 91.75 | 87 | 0.707 | -0.089 | 0.031 | -0.050 | -4 | 108 |
| 186 | 91.25 | 88 | 0.699 | -0.087 | 0.030 | -0.049 | -4 | 108 |
| 185 | 90.75 | 88 | 0.692 | -0.084 | 0.028 | -0.048 | -4 | 108 |
| 184 | 90.25 | 88 | 0.684 | -0.082 | 0.027 | -0.047 | -4 | 109 |
| 183 | 89.75 | 88 | 0.677 | -0.080 | 0.026 | -0.046 | -4 | 109 |
| 182 | 89.25 | 88 | 0.669 | -0.077 | 0.024 | -0.045 | -3 | 109 |
| 181 | 88.75 | 88 | 0.662 | -0.075 | 0.023 | -0.044 | -3 | 109 |
| 180 | 88.25 | 88 | 0.654 | -0.072 | 0.022 | -0.042 | -3 | 109 |
| 179 | 87.75 | 88 | 0.647 | -0.070 | 0.021 | -0.041 | -3 | 109 |
| 178 | 87.25 | 88 | 0.639 | -0.067 | 0.020 | -0.039 | -3 | 109 |
| 177 | 86.75 | 89 | 0.632 | -0.064 | 0.019 | -0.038 | -3 | 110 |
| 176 | 86.25 | 89 | 0.625 | -0.062 | 0.018 | -0.036 | -3 | 110 |
| 175 | 85.75 | 89 | 0.618 | -0.059 | 0.017 | -0.035 | -3 | 110 |
| 174 | 85.25 | 89 | 0.610 | -0.057 | 0.016 | -0.033 | -3 | 110 |
| 173 | 84.75 | 89 | 0.603 | -0.054 | 0.015 | -0.031 | -2 | 110 |
| 172 | 84.25 | 89 | 0.596 | -0.052 | 0.014 | -0.029 | -2 | 110 |
| 171 | 83.75 | 89 | 0.589 | -0.049 | 0.013 | -0.027 | -2 | 110 |
| 170 | 83.25 | 89 | 0.582 | -0.046 | 0.013 | -0.025 | -2 | 110 |
| 169 | 82.75 | 89 | 0.575 | -0.044 | 0.012 | -0.024 | -2 | 111 |
| 168 | 82.25 | 89 | 0.568 | -0.041 | 0.011 | -0.022 | -2 | 111 |
| 167 | 81.75 | 90 | 0.561 | -0.039 | 0.011 | -0.020 | -2 | 111 |
| 166 | 81.25 | 90 | 0.555 | -0.036 | 0.010 | -0.018 | -1 | 111 |
| 165 | 80.75 | 90 | 0.548 | -0.034 | 0.010 | -0.016 | -1 | 111 |
| 164 | 80.25 | 90 | 0.541 | -0.031 | 0.009 | -0.013 | -1 | 111 |
| 163 | 79.75 | 90 | 0.534 | -0.029 | 0.009 | -0.011 | -1 | 111 |
| 162 | 79.25 | 90 | 0.528 | -0.026 | 0.008 | -0.009 | -1 | 112 |
| 161 | 78.75 | 90 | 0.521 | -0.024 | 0.008 | -0.007 | -1 | 112 |
| 160 | 78.25 | 90 | 0.514 | -0.021 | 0.008 | -0.005 | 0 | 112 |
| 159 | 77.75 | 90 | 0.508 | -0.019 | 0.007 | -0.003 | 0 | 112 |
| 158 | 77.25 | 91 | 0.501 | -0.017 | 0.007 | -0.001 | 0 | 112 |
| 157 | 76.75 | 91 | 0.495 | -0.014 | 0.007 | 0.001 | 0 | 112 |
| 156 | 76.25 | 91 | 0.488 | -0.012 | 0.007 | 0.003 | 0 | 112 |
| 155 | 75.75 | 91 | 0.482 | -0.010 | 0.006 | 0.005 | 0 | 112 |
| 154 | 75.25 | 91 | 0.476 | -0.007 | 0.006 | 0.007 | 1 | 113 |
| 153 | 74.75 | 91 | 0.469 | -0.005 | 0.006 | 0.009 | 1 | 113 |
| 152 | 74.25 | 91 | 0.463 | -0.003 | 0.006 | 0.011 | 1 | 113 |
| 151 | 73.75 | 91 | 0.457 | -0.001 | 0.006 | 0.013 | 1 | 113 |
| 150 | 73.41 | 46 | 0.453 | 0.001 | 0.006 | 0.014 | 1 | 57 |
| 149 | 73.17 | 94 | 0.450 | 0.002 | 0.006 | 0.015 | 1 | 117 |
| 148 | 72.75 | 143 | 0.445 | 0.003 | 0.006 | 0.017 | 2 | 177 |
| 147 | 72.25 | 143 | 0.438 | 0.006 | 0.006 | 0.019 | 2 | 177 |
| 146 | 71.75 | 143 | 0.432 | 0.008 | 0.006 | 0.020 | 3 | 177 |
| 145 | 71.25 | 144 | 0.426 | 0.010 | 0.006 | 0.022 | 3 | 178 |
| 144 | 70.75 | 144 | 0.420 | 0.012 | 0.006 | 0.024 | 3 | 178 |
| 143 | 70.25 | 144 | 0.415 | 0.013 | 0.006 | 0.026 | 3 | 178 |
| 142 | 69.75 | 107 | 0.409 | 0.015 | 0.006 | 0.027 | 3 | 132 |


| Site Number: | 302494 |  | Code: ANSI/TIA-222-G | }{} |
| :--- | :--- | :--- | ---: | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:38 PM |
| Customer: | SPRINT NEXTEL |  |  |  |


| 141 | 69.25 | 107 | 0.403 | 0.017 | 0.006 | 0.029 | 3 | 132 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 140 | 68.75 | 107 | 0.397 | 0.019 | 0.007 | 0.030 | 3 | 133 |
| 139 | 68.25 | 107 | 0.391 | 0.021 | 0.007 | 0.032 | 3 | 133 |
| 138 | 67.75 | 107 | 0.386 | 0.023 | 0.007 | 0.033 | 3 | 133 |
| 137 | 67.25 | 108 | 0.380 | 0.024 | 0.007 | 0.035 | 3 | 133 |
| 136 | 66.75 | 108 | 0.374 | 0.026 | 0.007 | 0.036 | 3 | 133 |
| 135 | 66.25 | 108 | 0.369 | 0.028 | 0.008 | 0.037 | 3 | 133 |
| 134 | 65.75 | 108 | 0.363 | 0.029 | 0.008 | 0.038 | 4 | 134 |
| 133 | 65.25 | 108 | 0.358 | 0.031 | 0.008 | 0.040 | 4 | 134 |
| 132 | 64.75 | 108 | 0.352 | 0.032 | 0.009 | 0.041 | 4 | 134 |
| 131 | 64.25 | 108 | 0.347 | 0.034 | 0.009 | 0.042 | 4 | 134 |
| 130 | 63.75 | 108 | 0.341 | 0.035 | 0.009 | 0.043 | 4 | 134 |
| 129 | 63.25 | 109 | 0.336 | 0.037 | 0.010 | 0.044 | 4 | 134 |
| 128 | 62.75 | 109 | 0.331 | 0.038 | 0.010 | 0.045 | 4 | 135 |
| 127 | 62.25 | 109 | 0.326 | 0.039 | 0.010 | 0.046 | 4 | 135 |
| 126 | 61.75 | 109 | 0.320 | 0.040 | 0.011 | 0.046 | 4 | 135 |
| 125 | 61.25 | 109 | 0.315 | 0.042 | 0.011 | 0.047 | 4 | 135 |
| 124 | 60.75 | 109 | 0.310 | 0.043 | 0.011 | 0.048 | 5 | 135 |
| 123 | 60.25 | 109 | 0.305 | 0.044 | 0.012 | 0.049 | 5 | 135 |
| 122 | 59.75 | 110 | 0.300 | 0.045 | 0.012 | 0.049 | 5 | 136 |
| 121 | 59.25 | 110 | 0.295 | 0.046 | 0.013 | 0.050 | 5 | 136 |
| 120 | 58.75 | 110 | 0.290 | 0.048 | 0.013 | 0.050 | 5 | 136 |
| 119 | 58.25 | 110 | 0.285 | 0.049 | 0.014 | 0.051 | 5 | 136 |
| 118 | 57.75 | 110 | 0.280 | 0.050 | 0.014 | 0.052 | 5 | 136 |
| 117 | 57.25 | 110 | 0.275 | 0.051 | 0.014 | 0.052 | 5 | 136 |
| 116 | 56.75 | 110 | 0.271 | 0.051 | 0.015 | 0.052 | 5 | 137 |
| 115 | 56.25 | 110 | 0.266 | 0.052 | 0.015 | 0.053 | 5 | 137 |
| 114 | 55.75 | 111 | 0.261 | 0.053 | 0.016 | 0.053 | 5 | 137 |
| 113 | 55.25 | 111 | 0.256 | 0.054 | 0.016 | 0.054 | 5 | 137 |
| 112 | 54.75 | 111 | 0.252 | 0.055 | 0.017 | 0.054 | 5 | 137 |
| 111 | 54.25 | 111 | 0.247 | 0.056 | 0.017 | 0.054 | 5 | 137 |
| 110 | 53.75 | 111 | 0.243 | 0.057 | 0.018 | 0.054 | 5 | 138 |
| 109 | 53.25 | 111 | 0.238 | 0.057 | 0.018 | 0.055 | 5 | 138 |
| 108 | 52.75 | 111 | 0.234 | 0.058 | 0.019 | 0.055 | 5 | 138 |
| 107 | 52.25 | 112 | 0.229 | 0.059 | 0.020 | 0.055 | 5 | 138 |
| 106 | 51.75 | 112 | 0.225 | 0.059 | 0.020 | 0.055 | 5 | 138 |
| 105 | 51.25 | 112 | 0.221 | 0.060 | 0.021 | 0.055 | 5 | 138 |
| 104 | 50.75 | 112 | 0.216 | 0.061 | 0.021 | 0.055 | 5 | 139 |
| 103 | 50.25 | 112 | 0.212 | 0.061 | 0.022 | 0.055 | 5 | 139 |
| 102 | 49.75 | 112 | 0.208 | 0.062 | 0.022 | 0.056 | 5 | 139 |
| 101 | 49.25 | 112 | 0.204 | 0.062 | 0.023 | 0.056 | 5 | 139 |
| 100 | 48.75 | 113 | 0.200 | 0.063 | 0.023 | 0.056 | 5 | 139 |
| 99 98 | 48.25 47.75 | $\begin{aligned} & 113 \\ & 113 \end{aligned}$ | $\begin{aligned} & 0.196 \\ & 0.192 \end{aligned}$ | $0.063$ | $0.024$ $0.024$ | 0.056 0.056 | 5 5 | 139 140 |
| 97 | 47.75 47.25 | 113 113 | 0.192 <br> 0.188 | $0.064$ | 0.024 0.025 | 0.056 0.056 | 5 | 140 |
| 96 | 46.75 | 113 | 0.184 | 0.065 | 0.025 | 0.056 | 5 | 140 |
| 95 | 46.25 | 113 | 0.180 | 0.065 | 0.026 | 0.056 | 5 | 140 |
| 94 | 45.75 | 113 | 0.176 | 0.066 | 0.026 | 0.056 | 5 | 140 |
| 93 | 45.25 | 113 | 0.172 | 0.066 | 0.027 | 0.056 | 5 | 140 |
| 92 | 44.75 | 114 | 0.168 | 0.066 | 0.028 | 0.055 | 5 | 141 |
| 91 | 44.25 | 114 | 0.164 | 0.067 | 0.028 | 0.055 | 5 | 141 |
| 90 | 43.75 | 114 | 0.161 | 0.067 | 0.029 | 0.055 | 5 | 141 |
| 89 | 43.25 | 114 | 0.157 | 0.067 | 0.029 | 0.055 | 5 | 141 |
| 88 | 42.75 | 114 | 0.154 | 0.068 | 0.030 | 0.055 | 5 | 141 |
| 87 | 42.25 | 114 | 0.150 | 0.068 | 0.030 | 0.055 | 5 | 141 |
| 86 | 41.75 | 114 | 0.146 | 0.068 | 0.031 | 0.055 | 5 | 142 |
| 85 | 41.25 | 115 | 0.143 | 0.068 | 0.031 | 0.055 | 5 | 142 |
| 84 | 40.75 | 115 | 0.139 | 0.069 | 0.032 | 0.055 | 5 | 142 |
| 83 | 40.25 | 115 | 0.136 | 0.069 | 0.032 | 0.055 | 5 | 142 |
| 82 | 39.75 | 115 | 0.133 | 0.069 | 0.033 | 0.055 | 5 | 142 |
| 81 | 39.25 | 115 | 0.129 | 0.069 | 0.033 | 0.054 | 5 | 142 |
| 80 | 38.75 | 115 | 0.126 | 0.070 | 0.034 | 0.054 | 5 | 143 |
| 79 | 38.25 | 115 | 0.123 | 0.070 | 0.034 | 0.054 | 5 | 143 |
| 78 | 37.75 | 115 | 0.120 | 0.070 | 0.034 | 0.054 | 5 | 143 |


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| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 20185: 54: 38$ PM |

Customer: $\quad$ SPRINT NEXTEL

|  |  |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | :--- |
|  |  |  |  |  |  |  |  |

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| Site Number: 302494 | Code: ANSI/TIA-222-G | c2007-2018 by ATC IP LLC. All rights reserved. |
| :---: | :---: | :---: |

Site Name: Hddm - Haddam, CT Engineering Number: OAA712589_C3_05 4/24/2018 5:54:38 PM
Customer: SPRINT NEXTEL

| 13 | 6.25 | 119 | 0.003 | 0.039 | 0.022 | 0.032 | 3 | 147 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 12 | 5.75 | 119 | 0.003 | 0.036 | 0.020 | 0.030 | 3 | 147 |
| 11 | 5.25 | 119 | 0.002 | 0.034 | 0.019 | 0.029 | 3 | 147 |
| 10 | 4.75 | 119 | 0.002 | 0.031 | 0.017 | 0.027 | 3 | 147 |
| 9 | 4.25 | 119 | 0.002 | 0.029 | 0.016 | 0.025 | 3 | 148 |
| 8 | 3.75 | 119 | 0.001 | 0.026 | 0.014 | 0.023 | 2 | 148 |
| 7 | 3.25 | 120 | 0.001 | 0.023 | 0.012 | 0.021 | 2 | 148 |
| 6 | 2.75 | 120 | 0.001 | 0.020 | 0.011 | 0.018 | 2 | 148 |
| 5 | 2.25 | 120 | 0.000 | 0.017 | 0.009 | 0.016 | 2 | 148 |
| 4 | 1.75 | 120 | 0.000 | 0.013 | 0.007 | 0.013 | 1 | 149 |
| 3 | 1.25 | 120 | 0.000 | 0.010 | 0.005 | 0.009 | 1 | 149 |
| 2 | 0.75 | 120 | 0.000 | 0.006 | 0.003 | 0.006 | 1 | 149 |
| $1$ | 0.25 | 121 | 0.000 | 0.002 | 0.001 | 0.002 | 0 | 149 |
| Kaelus DBC0061F1V51- | 150.00 | 153 | 1.890 | 1.980 | 1.140 | 0.354 | 47 | 189 |
| Decibel DB910CE-M | 150.00 | 16 | 1.890 | 1.980 | 1.140 | 0.354 | 5 | 20 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 1.890 | 1.980 | 1.140 | 0.354 | 10 | 39 |
| Raycap DC6-48-60-18- | 150.00 | 32 | 1.890 | 1.980 | 1.140 | 0.354 | 10 | 39 |
| Powerwave LGP17201 | 150.00 | 186 | 1.890 | 1.980 | 1.140 | 0.354 | 57 | 230 |
| Ericsson RRUS 11 (Ba | 150.00 | 165 | 1.890 | 1.980 | 1.140 | 0.354 | 51 | 204 |
| Ericsson RRUS 32 (50 | 150.00 | 152 | 1.890 | 1.980 | 1.140 | 0.354 | 47 | 189 |
| Ericsson RRUS 32 B2 | 150.00 | 159 | 1.890 | 1.980 | 1.140 | 0.354 | 49 | 197 |
| Powerwave Allgon 777 | 150.00 | 105 | 1.890 | 1.980 | 1.140 | 0.354 | 32 | 130 |
| KMW AM-X-CD-16-65-00 | 150.00 | 97 | 1.890 | 1.980 | 1.140 | 0.354 | 30 | 120 |
| Quintel QS66512-2 | 150.00 | 333 | 1.890 | 1.980 | 1.140 | 0.354 | 102 | 412 |
| Powerwave P65-17-XLH | 150.00 | 50 | 1.890 | 1.980 | 1.140 | 0.354 | 15 | 62 |
| Round Platform w/ Ha | 150.00 | 2,000 | 1.890 | 1.980 | 1.140 | 0.354 | 613 | 2,475 |
| RFS APXV18-206517LS- | 141.00 | 66 | 1.670 | 1.012 | 0.769 | 0.223 | 13 | 82 |
| Alcatel-Lucent RRH2x | 131.00 | 317 | 1.442 | 0.367 | 0.476 | 0.109 | 30 | 393 |
| Alcatel-Lucent 1900 | 131.00 | 180 | 1.442 | 0.367 | 0.476 | 0.109 | 17 | 223 |
| Decibel DB844H90E-XY | 131.00 | 84 | 1.442 | 0.367 | 0.476 | 0.109 | 8 | 104 |
| Alcatel-Lucent TD-RR | 131.00 | 210 | 1.442 | 0.367 | 0.476 | 0.109 | 20 | 260 |
| RFS APXVTM14-ALU-I20 | 131.00 | 169 | 1.442 | 0.367 | 0.476 | 0.109 | 16 | 209 |
| Commscope NNVV- | 131.00 | 232 | 1.442 | 0.367 | 0.476 | 0.109 | 22 | 287 |
| Round Platform w/ Ha | 131.00 | 2,000 | 1.442 | 0.367 | 0.476 | 0.109 | 188 | 2,475 |
|  |  | 35,073 | 226.002 | 73.461 | 67.148 | 19.212 | 2,174 | 43,405 |
| Load Case (0.9-0.2Sds)*DL + E EMAM |  |  | Seismic (Reduced DL) Equivalent Modal Analysis Method |  |  |  |  |  |
| Segment | Height Above Base (ft) | Weight <br> (b) | a | b | c | Saz | Horizontal Force (b) | Vertical Force (b) |
| 303 | 149.75 | 30 | 1.884 | 1.947 | 1.128 | 0.350 | 9 | 26 |
| 302 | 149.25 | 30 | 1.871 | 1.882 | 1.105 | 0.342 | 9 | 26 |
| 301 | 148.75 | 30 | 1.859 | 1.819 | 1.081 | 0.334 | 9 | 26 |
| 300 | 148.25 | 30 | 1.846 | 1.757 | 1.059 | 0.326 | 8 | 26 |
| 299 | 147.75 | 30 | 1.834 | 1.696 | 1.036 | 0.319 | 8 | 26 |
| 298 | 147.25 | 30 | 1.821 | 1.637 | 1.014 | 0.311 | 8 | 26 |
| 297 | 146.75 | 30 | 1.809 | 1.580 | 0.993 | 0.303 | 8 | 26 |
| 296 | 146.25 | 30 | 1.797 | 1.523 | 0.972 | 0.296 | 8 | 26 |
| 295 | 145.75 | 30 | 1.784 | 1.469 | 0.951 | 0.289 | 8 | 26 |
| 294 | 145.25 | 31 | 1.772 | 1.415 | 0.930 | 0.282 | 7 | 26 |
| 293 | 144.75 | 31 | 1.760 | 1.363 | 0.910 | 0.274 | 7 | 26 |
| 292 | 144.25 | 31 | 1.748 | 1.312 | 0.890 | 0.267 | 7 | 26 |
| 291 | 143.75 | 31 | 1.736 | 1.263 | 0.871 | 0.260 | 7 | 27 |
| 290 | 143.25 | 31 | 1.724 | 1.214 | 0.851 | 0.253 | 7 | 27 |
| 289 | 142.75 | 31 | 1.712 | 1.167 | 0.833 | 0.247 | 7 | 27 |
| 288 | 142.25 | 31 | 1.700 | 1.121 | 0.814 | 0.240 | 6 | 27 |
| 287 | 141.75 | 31 | 1.688 | 1.077 | 0.796 | 0.233 | 6 | 27 |
| 286 | 141.25 | 31 | 1.676 | 1.033 | 0.778 | 0.226 | 6 | 27 |
| 285 | 140.75 | 34 | 1.664 | 0.991 | 0.761 | 0.220 | 6 | 29 |

Site Number: 302494

Customer: SPRINT NEXTEL

| 284 | 140.25 | 34 | 1.652 | 0.950 | 0.743 | 0.214 | 6 | 29 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 283 | 139.75 | 34 | 1.641 | 0.909 | 0.726 | 0.207 | 6 | 29 |
| 282 | 139.25 | 34 | 1.629 | 0.870 | 0.710 | 0.201 | 6 | 29 |
| 281 | 138.75 | 34 | 1.617 | 0.832 | 0.694 | 0.195 | 6 | 29 |
| 280 | 138.25 | 34 | 1.605 | 0.796 | 0.678 | 0.189 | 6 | 29 |
| 279 | 137.75 | 34 | 1.594 | 0.760 | 0.662 | 0.183 | 5 | 30 |
| 278 | 137.25 | 34 | 1.582 | 0.725 | 0.646 | 0.177 | 5 | 30 |
| 277 | 136.75 | 34 | 1.571 | 0.691 | 0.631 | 0.171 | 5 | 30 |
| 276 | 136.25 | 34 | 1.559 | 0.658 | 0.616 | 0.165 | 5 | 30 |
| 275 | 135.75 | 35 | 1.548 | 0.626 | 0.602 | 0.159 | 5 | 30 |
| 274 | 135.25 | 35 | 1.537 | 0.595 | 0.587 | 0.153 | 5 | 30 |
| 273 | 134.75 | 35 | 1.525 | 0.565 | 0.573 | 0.148 | 4 | 30 |
| 272 | 134.25 | 35 | 1.514 | 0.536 | 0.560 | 0.142 | 4 | 30 |
| 271 | 133.75 | 35 | 1.503 | 0.508 | 0.546 | 0.137 | 4 | 30 |
| 270 | 133.25 | 35 | 1.491 | 0.480 | 0.533 | 0.132 | 4 | 30 |
| 269 | 132.75 | 35 | 1.480 | 0.454 | 0.520 | 0.126 | 4 | 30 |
| 268 | 132.25 | 35 | 1.469 | 0.428 | 0.507 | 0.121 | 4 | 30 |
| 267 | 131.75 | 35 | 1.458 | 0.403 | 0.494 | 0.116 | 4 | 30 |
| 266 | 131.25 | 35 | 1.447 | 0.379 | 0.482 | 0.111 | 3 | 30 |
| 265 | 130.75 | 41 | 1.436 | 0.356 | 0.470 | 0.106 | 4 | 35 |
| 264 | 130.25 | 41 | 1.425 | 0.333 | 0.458 | 0.101 | 4 | 36 |
| 263 | 129.75 | 41 | 1.414 | 0.311 | 0.447 | 0.096 | 3 | 36 |
| 262 | 129.25 | 41 | 1.403 | 0.290 | 0.435 | 0.092 | 3 | 36 |
| 261 | 128.75 | 41 | 1.392 | 0.270 | 0.424 | 0.087 | 3 | 36 |
| 260 | 128.25 | 42 | 1.382 | 0.250 | 0.413 | 0.083 | 3 | 36 |
| 259 | 127.75 | 42 | 1.371 | 0.231 | 0.402 | 0.078 | 3 | 36 |
| 258 | 127.25 | 42 | 1.360 | 0.213 | 0.392 | 0.074 | 3 | 36 |
| 257 | 126.75 | 42 | 1.350 | 0.195 | 0.382 | 0.069 | 3 | 36 |
| 256 | 126.25 | 42 | 1.339 | 0.178 | 0.372 | 0.065 | 2 | 36 |
| 255 | 125.75 | 42 | 1.328 | 0.162 | 0.362 | 0.061 | 2 | 36 |
| 254 | 125.25 | 42 | 1.318 | 0.146 | 0.352 | 0.057 | 2 | 36 |
| 253 | 124.75 | 42 | 1.307 | 0.131 | 0.343 | 0.053 | 2 | 36 |
| 252 | 124.25 | 42 | 1.297 | 0.116 | 0.333 | 0.049 | 2 | 36 |
| 251 | 123.75 | 42 | 1.286 | 0.102 | 0.324 | 0.045 | 2 | 36 |
| 250 | 123.25 | 42 | 1.276 | 0.089 | 0.315 | 0.041 | 2 | 36 |
| 249 | 122.75 | 42 | 1.266 | 0.076 | 0.307 | 0.037 | 1 | 37 |
| 248 | 122.25 | 42 | 1.255 | 0.063 | 0.298 | 0.033 | 1 | 37 |
| 247 | 121.75 | 43 | 1.245 | 0.052 | 0.290 | 0.030 | 1 | 37 |
| 246 | 121.25 | 43 | 1.235 | 0.040 | 0.282 | 0.026 | 1 | 37 |
| 245 | 120.75 | 43 | 1.225 | 0.029 | 0.274 | 0.023 | 1 | 37 |
| 244 | 120.25 | 43 | 1.215 | 0.019 | 0.266 | 0.020 | 1 | 37 |
| 243 | 119.75 | 43 | 1.205 | 0.009 | 0.258 | 0.016 | 1 | 37 |
| 242 | $\begin{aligned} & 119.25 \\ & 118.75 \end{aligned}$ | 43 43 | $\begin{aligned} & 1.195 \\ & 1.185 \end{aligned}$ | $\begin{array}{r} 0.000 \\ -0.009 \end{array}$ | 0.251 0.243 | $\begin{aligned} & 0.013 \\ & 0.010 \end{aligned}$ | 0 0 | 37 37 |
| 240 | 118.25 | 43 | 1.175 | -0.018 | 0.236 | 0.007 | 0 | 37 |
| 239 | 117.75 | 43 | 1.165 | -0.026 | 0.229 | 0.004 | 0 | 37 |
| 238 | 117.25 | 43 | 1.155 | -0.034 | 0.222 | 0.001 | 0 | 37 |
| 237 | 116.75 | 43 | 1.145 | -0.041 | 0.216 | -0.002 | 0 | 37 |
| 236 | 116.25 | 69 | 1.135 | -0.048 | 0.209 | -0.005 | 0 | 59 |
| 235 | 115.75 | 69 | 1.125 | -0.054 | 0.203 | -0.008 | 0 | 60 |
| 234 | 115.25 | 69 | 1.116 | -0.061 | 0.197 | -0.010 | -1 | 60 |
| 233 | 114.75 | 69 | 1.106 | -0.066 | 0.191 | -0.013 | -1 | 60 |
| 232 | 114.25 | 69 | 1.096 | -0.072 | 0.185 | -0.015 | -1 | 60 |
| 231 | 113.75 | 69 | 1.087 | -0.077 | 0.179 | -0.018 | -1 | 60 |
| 230 | 113.25 | 69 | 1.077 | -0.082 | 0.173 | -0.020 | -1 | 60 |
| 229 | 112.75 | 70 | 1.068 | -0.086 | 0.168 | -0.022 | -1 | 60 |
| 228 | 112.25 | 70 | 1.058 | -0.090 | 0.162 | -0.025 | -1 | 60 |
| 227 | 111.75 | 70 | 1.049 | -0.094 | 0.157 | -0.027 | -2 | 60 |
| 226 | 111.25 | 70 | 1.040 | -0.098 | 0.152 | -0.029 | -2 | 60 |
| 225 | 110.75 | 70 | 1.030 | -0.101 | 0.147 | -0.031 | -2 | 60 |
| 224 | 110.25 | 70 | 1.021 | -0.104 | 0.142 | -0.033 | -2 | 60 |
| 223 | 109.75 | 84 | 1.012 | -0.107 | 0.137 | -0.034 | -2 | 72 |
| 222 | 109.25 | 84 | 1.003 | -0.109 | 0.133 | -0.036 | -3 | 72 |
| 221 | 108.75 | 84 | 0.993 | -0.111 | 0.128 | -0.038 | -3 | 72 |

Site Number: 302494
Code: ANSI/TIA-222-G @2007-2018 by ATC IP LLC. All rights reserved.
Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:38 PM
Customer: SPRINT NEXTEL

| 220 | 108.25 | 84 | 0.984 | -0.113 | 0.124 | -0.040 | -3 | 72 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 219 | 107.75 | 84 | 0.975 | -0.115 | 0.119 | -0.040 | -3 -3 | 72 |
| 218 | 107.25 | 84 | 0.966 | -0.117 | 0.115 | -0.043 | -3 | 73 |
| 217 | 106.75 | 84 | 0.957 | -0.118 | 0.111 | -0.044 | -3 | 73 |
| 216 | 106.25 | 84 | 0.948 | -0.119 | 0.107 | -0.045 | -3 | 73 |
| 215 | 105.75 | 84 | 0.939 | -0.120 | 0.103 | -0.047 | -3 | 73 |
| 214 | 105.25 | 85 | 0.931 | -0.121 | 0.100 | -0.048 | -3 | 73 |
| 213 | 104.75 | 85 | 0.922 | -0.121 | 0.096 | -0.049 | -4 | 73 |
| 212 | 104.25 | 85 | 0.913 | -0.122 | 0.092 | -0.050 | -4 | 73 |
| 211 210 | 103.75 | 85 | 0.904 | -0.122 | 0.089 | -0.051 | -4 | 73 |
| 210 209 | 103.25 102.75 | 85 85 | 0.895 0.887 | -0.122 | 0.086 | -0.052 | -4 | 73 |
| 208 | 102.25 | 85 | 0.878 | -0.122 | 0.079 | -0.052 | -4 | 73 |
| 207 | 101.75 | 85 | 0.870 | -0.121 | 0.076 | -0.053 | -4 | 73 74 |
| 206 | 101.25 | 85 | 0.861 | -0.120 | 0.073 | -0.054 | -4 | 74 |
| 205 | 100.75 | 86 | 0.853 | -0.119 | 0.070 | -0.055 | -4 | 74 |
| 204 | 100.25 | 86 | 0.844 | -0.119 | 0.067 | -0.055 | -4 | 74 |
| 203 | 99.75 | 86 | 0.836 | -0.118 | 0.065 | -0.056 | -4 | 74 |
| 202 | 99.25 | 86 | 0.827 | -0.116 | 0.062 | -0.056 | -4 | 74 |
| 201 | 98.75 | 86 | 0.819 | -0.115 | 0.059 | -0.056 | -4 | 74 |
| 199 | 98.25 97.75 | 86 86 | 0.811 | -0.114 | 0.057 | -0.056 | -4 | 74 |
| 198 | 97.25 | 86 | 0.803 | -0.112 | 0.055 | -0.056 | -4 | 74 |
| 197 | 96.75 | 86 86 | 0.794 0.786 | -0.111 -0.109 | 0.052 0.050 | -0.056 | -4 | 74 74 |
| 196 | 96.25 | 86 | 0.778 | -0.108 | 0.048 | -0.056 | -4 | 75 |
| 195 | 95.75 | 87 | 0.770 | -0.106 | 0.046 | -0.055 | -4 | 75 |
| 194 | 95.25 | 87 | 0.762 | -0.104 | 0.044 | -0.055 | -4 | 75 |
| 193 | 94.75 | 87 | 0.754 | -0.102 | 0.042 | -0.055 | -4 | 75 |
| 192 | 94.25 | 87 | 0.746 | -0.100 | 0.040 | -0.054 | -4 | 75 |
| 191 190 | 93.75 | 87 | 0.738 | -0.098 | 0.038 | -0.054 | -4 | 75 |
| 190 | 93.25 | 87 | 0.730 | -0.096 | 0.036 | -0.053 | -4 | 75 |
| 189 188 | 92.75 92.25 | 87 87 | 0.723 | -0.094 | 0.034 | -0.052 | -4 | 75 |
| 188 187 | 92.25 | 87 | 0.715 | -0.091 | 0.033 | -0.051 | -4 | 75 |
| 186 | 91.75 91.25 | 88 | 0.707 | -0.089 | 0.031 | -0.050 | -4 | 75 |
| 185 | 90.75 | 88 | 0.692 | -0.084 | 0.028 | -0.048 | -4 | 76 |
| 184 | 90.25 | 88 | 0.684 | -0.082 | 0.027 | -0.047 | -4 | 76 |
| 183 | 89.75 | 88 | 0.677 | -0.080 | 0.026 | -0.046 | -4 | 76 |
| 182 | 89.25 | 88 | 0.669 | -0.077 | 0.024 | -0.045 | -3 | 76 |
| 181 | 88.75 | 88 | 0.662 | -0.075 | 0.023 | -0.044 | -3 | 76 |
| 180 | 88.25 | 88 | 0.654 | -0.072 | 0.022 | -0.042 | -3 | 76 |
| 179 | 87.75 | 88 | 0.647 | -0.070 | 0.021 | -0.041 | -3 | 76 |
| 178 177 176 | 87.25 86.75 | 88 89 | $\begin{aligned} & 0.639 \\ & 0.632 \end{aligned}$ | -0.067 -0.064 | 0.020 0.019 | $\begin{aligned} & -0.039 \\ & -0.038 \end{aligned}$ | -3 | 76 76 |
| 176 | 86.25 | 89 | 0.625 | -0.062 | 0.018 | -0.036 | -3 | 76 |
| 175 | 85.75 | 89 | 0.618 | -0.059 | 0.017 | -0.035 | -3 | 77 |
| 174 | 85.25 | 89 | 0.610 | -0.057 | 0.016 | -0.033 | -3 | 77 |
| 173 | 84.75 | 89 | 0.603 | -0.054 | 0.015 | -0.031 | -2 | 77 |
| 172 171 | 84.25 83.75 | 89 | 0.596 | -0.052 | 0.014 | -0.029 | -2 | 77 |
| 170 | 83.25 | 89 | 0.589 | -0.049 | 0.013 | -0.027 | -2 | 77 |
| 169 | 82.75 | 89 | 0.575 | -0.044 | 0.012 | -0.024 | -2 | 77 |
| 168 | 82.25 | 89 | 0.568 | -0.041 | 0.011 | -0.022 | -2 | 77 |
| 167 | 81.75 | 90 | 0.561 | -0.039 | 0.011 | -0.020 | -2 | 77 |
| 166 | 81.25 | 90 | 0.555 | -0.036 | 0.010 | -0.018 | -1 | 77 |
| 165 | 80.75 80.25 | 90 | 0.548 | -0.034 | 0.010 | -0.016 | -1 | 77 |
| 164 163 | 80.25 79.75 | 90 90 | 0.541 0.534 | -0.031 -0.029 | 0.009 | -0.013 | -1 | 78 |
| 162 | 79.25 | 90 | 0.534 0.528 | -0.029 | 0.009 0.008 | -0.011 | -1 | 78 |
| 161 | 78.75 | 90 | 0.521 | -0.024 | 0.008 | -0.007 | -1 | 78 |
| 160 | 78.25 | 90 | 0.514 | -0.021 | 0.008 | -0.005 | 0 | 78 |
| 159 | 77.75 | 90 | 0.508 | -0.019 | 0.007 | -0.003 | 0 | 78 |
| 158 | 77.25 | 91 | 0.501 | -0.017 | 0.007 | -0.001 | 0 | 78 |
| 157 | 76.75 | 91 | 0.495 | -0.014 | 0.007 | 0.001 | 0 | 78 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | ---: | ---: |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589_C3_05 |


| 156 | 76.25 | 91 | 0.488 | -0.012 | 0.007 | 0.003 | 0 | 78 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 155 | 75.75 | 91 | 0.482 | -0.010 | 0.006 | 0.005 | 0 | 78 |
| 154 | 75.25 | 91 | 0.476 | -0.007 | 0.006 | 0.007 | 1 | 78 |
| 153 | 74.75 | 91 | 0.469 | -0.005 | 0.006 | 0.009 | 1 | 79 |
| 152 | 74.25 | 91 | 0.463 | -0.003 | 0.006 | 0.011 | 1 | 79 |
| 151 | 73.75 | 91 | 0.457 | -0.001 | 0.006 | 0.013 | 1 | 79 |
| 150 | 73.41 | 46 | 0.453 | 0.001 | 0.006 | 0.014 | 1 | 40 |
| 149 | 73.17 | 94 | 0.450 | 0.002 | 0.006 | 0.015 | 1 | 81 |
| 148 | 72.75 | 143 | 0.445 | 0.003 | 0.006 | 0.017 | 2 | 123 |
| 147 | 72.25 | 143 | 0.438 | 0.006 | 0.006 | 0.019 | 2 | 123 |
| 146 | 71.75 | 143 | 0.432 | 0.008 | 0.006 | 0.020 | 3 | 124 |
| 145 | 71.25 | 144 | 0.426 | 0.010 | 0.006 | 0.022 | 3 | 124 |
| 144 | 70.75 | 144 | 0.420 | 0.012 | 0.006 | 0.024 | 3 | 124 |
| 143 | 70.25 | 144 | 0.415 | 0.013 | 0.006 | 0.026 | 3 | 124 |
| 142 | 69.75 | 107 | 0.409 | 0.015 | 0.006 | 0.027 | 3 | 92 |
| 141 | 69.25 | 107 | 0.403 | 0.017 | 0.006 | 0.029 | 3 | 92 |
| 140 | 68.75 | 107 | 0.397 | 0.019 | 0.007 | 0.030 | 3 | 92 |
| 139 | 68.25 | 107 | 0.391 | 0.021 | 0.007 | 0.032 | 3 | 93 |
| 138 | 67.75 | 107 | 0.386 | 0.023 | 0.007 | 0.033 | 3 | 93 |
| 137 | 67.25 | 108 | 0.380 | 0.024 | 0.007 | 0.035 | 3 | 93 |
| 136 | 66.75 | 108 | 0.374 | 0.026 | 0.007 | 0.036 | 3 | 93 |
| 135 | 66.25 | 108 | 0.369 | 0.028 | 0.008 | 0.037 | 3 | 93 |
| 134 | 65.75 | 108 | 0.363 | 0.029 | 0.008 | 0.038 | 4 | 93 |
| 133 | 65.25 | 108 | 0.358 | 0.031 | 0.008 | 0.040 | 4 | 93 |
| 132 | 64.75 | 108 | 0.352 | 0.032 | 0.009 | 0.041 | 4 | 93 |
| 131 | 64.25 | 108 | 0.347 | 0.034 | 0.009 | 0.042 | 4 | 93 |
| 130 | 63.75 | 108 | 0.341 | 0.035 | 0.009 | 0.043 | 4 | 94 |
| 129 | 63.25 | 109 | 0.336 | 0.037 | 0.010 | 0.044 | 4 | 94 |
| 128 | 62.75 | 109 | 0.331 | 0.038 | 0.010 | 0.045 | 4 | 94 |
| 127 | 62.25 | 109 | 0.326 | 0.039 | 0.010 | 0.046 | 4 | 94 |
| 126 | 61.75 | 109 | 0.320 | 0.040 | 0.011 | 0.046 | 4 | 94 |
| 125 | 61.25 | 109 | 0.315 | 0.042 | 0.011 | 0.047 | 4 | 94 |
| 124 | 60.75 | 109 | 0.310 | 0.043 | 0.011 | 0.048 | 5 | 94 |
| 123 | 60.25 | 109 | 0.305 | 0.044 | 0.012 | 0.049 | 5 | 94 |
| 122 | 59.75 | 110 | 0.300 | 0.045 | 0.012 | 0.049 | 5 | 94 |
| 121 | 59.25 58.75 | 110 | 0.295 | 0.046 | 0.013 | 0.050 | 5 | 95 |
| 120 | 58.75 | 110 | 0.290 | 0.048 | 0.013 | 0.050 | 5 | 95 |
| 119 | 58.25 | 110 | 0.285 | 0.049 | 0.014 | 0.051 | 5 | 95 |
| 118 | 57.75 | 110 | 0.280 | 0.050 | 0.014 | 0.052 | 5 | 95 |
| 117 | 57.25 | 110 | 0.275 | 0.051 | 0.014 | 0.052 | 5 | 95 |
| 116 | 56.75 | 110 | 0.271 | 0.051 | 0.015 | 0.052 | 5 | 95 |
| 115 | 56.25 | 110 | 0.266 | 0.052 | 0.015 | 0.053 | 5 | 95 |
| 114 113 | 55.75 55.25 | 111 | 0.261 0.256 | 0.053 0.054 | 0.016 0.016 | 0.053 | 5 | 95 |
| 112 | 54.75 | 111 | 0.252 | 0.055 | 0.017 | 0.054 | 5 5 | 96 96 |
| 111 | 54.25 | 111 | 0.247 | 0.056 | 0.017 | 0.054 | 5 | 96 |
| 110 | 53.75 | 111 | 0.243 | 0.057 | 0.018 | 0.054 | 5 | 96 |
| 109 | 53.25 | 111 | 0.238 | 0.057 | 0.018 | 0.055 | 5 | 96 |
| 108 | 52.75 | 111 | 0.234 | 0.058 | 0.019 | 0.055 | 5 | 96 |
| 107 | 52.25 | 112 | 0.229 | 0.059 | 0.020 | 0.055 | 5 | 96 |
| 106 | 51.75 | 112 | 0.225 | 0.059 | 0.020 | 0.055 | 5 | 96 |
| 105 | 51.25 | 112 | 0.221 | 0.060 | 0.021 | 0.055 | 5 | 96 |
| 104 | 50.75 | 112 | 0.216 | 0.061 | 0.021 | 0.055 | 5 | 97 |
| 103 | 50.25 | 112 | 0.212 | 0.061 | 0.022 | 0.055 | 5 | 97 |
| 102 | 49.75 | 112 | 0.208 | 0.062 | 0.022 | 0.056 | 5 | 97 |
| 101 100 | 49.25 48.75 | 112 | 0.204 | 0.062 | 0.023 | 0.056 | 5 | 97 |
| 99 | 48.75 48.25 | 113 113 | 0.200 0.196 | 0.063 0.063 | 0.023 0.024 | 0.056 0.056 | 5 5 | 97 97 |
| 98 | 47.75 | 113 | 0.192 | 0.064 | 0.024 | 0.056 | 5 | 97 |
| 97 | 47.25 | 113 | 0.188 | 0.064 | 0.025 | 0.056 | 5 | 97 |
| 96 | 46.75 | 113 | 0.184 | 0.065 | 0.025 | 0.056 | 5 | 97 |
| 95 | 46.25 | 113 | 0.180 | 0.065 | 0.026 | 0.056 | 5 | 98 |
| 94 | 45.75 | 113 | 0.176 | 0.066 | 0.026 | 0.056 | 5 | 98 |
| 93 | 45.25 | 113 | 0.172 | 0.066 | 0.027 | 0.056 | 5 | 98 |

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| Site Number: | 302494 | Code: ANSI/TIA-222-G | @2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: | OAA712589 C3 |

Customer: SPRINT NEXTEL

| 92 | 44.75 | 114 | 0.168 | 0.066 | 0.028 | 0.055 | 5 | 98 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 91 | 44.25 | 114 | 0.164 | 0.067 | 0.028 | 0.055 | 5 | 98 |
| 90 | 43.75 | 114 | 0.161 | 0.067 | 0.029 | 0.055 | 5 | 98 |
| 89 | 43.25 | 114 | 0.157 | 0.067 | 0.029 | 0.055 | 5 | 98 |
| 88 | 42.75 | 114 | 0.154 | 0.068 | 0.030 | 0.055 | 5 | 98 |
| 87 | 42.25 | 114 | 0.150 | 0.068 | 0.030 | 0.055 | 5 | 98 |
| 86 | 41.75 | 114 | 0.146 | 0.068 | 0.031 | 0.055 | 5 | 99 |
| 85 | 41.25 | 115 | 0.143 | 0.068 | 0.031 | 0.055 | 5 | 99 |
| 84 | 40.75 | 115 | 0.139 | 0.069 | 0.032 | 0.055 | 5 | 99 99 |
| 83 | 40.25 | 115 | 0.136 | 0.069 | 0.032 | 0.055 | 5 | 99 |
| 82 | 39.75 | 115 | 0.133 | 0.069 | 0.033 | 0.055 | 5 | 99 |
| 81 | 39.25 | 115 | 0.129 | 0.069 | 0.033 | 0.054 | 5 | 99 |
| 80 | 38.75 | 115 | 0.126 | 0.070 | 0.034 | 0.054 | 5 | 99 |
| 79 | 38.25 | 115 | 0.123 | 0.070 | 0.034 | 0.054 | 5 | 99 |
| 78 | 37.75 | 115 | 0.120 | 0.070 | 0.034 | 0.054 | 5 | 99 100 |
| 77 | 37.25 | 116 | 0.117 | 0.070 | 0.035 | 0.054 | 5 | 100 |
| 76 | 36.83 | 76 | 0.114 | 0.070 | 0.035 | 0.054 | 4 | 100 66 |
| 75 | 36.58 | 42 | 0.112 | 0.070 | 0.035 | 0.054 | 2 | 36 |
| 74 | 36.25 | 122 | 0.110 | 0.070 | 0.036 | 0.054 | 6 | 105 |
| 73 | 35.83 | 82 | 0.108 | 0.071 | 0.036 | 0.054 | 4 | 70 |
| 72 | 35.58 | 62 | 0.106 | 0.071 | 0.036 | 0.054 | 3 | 54 |
| 71 | 35.25 | 187 | 0.104 | 0.071 | 0.037 | 0.053 | 9 | 161 |
| 70 69 | $\begin{aligned} & 34.75 \\ & 34.25 \end{aligned}$ | $187$ | 0.101 0.099 | 0.071 0.071 | 0.037 0.037 | 0.053 | 9 | 162 |
| 68 | 34.25 33.75 | 188 188 | 0.099 0.096 | 0.071 0.071 | 0.037 0.038 | 0.053 0.053 | 9 | 162 |
| 67 | 33.25 | 188 | 0.093 | 0.071 | 0.038 | 0.053 | 9 | 162 162 |
| 66 | 32.75 | 189 | 0.090 | 0.071 | 0.038 | 0.053 | 9 | 163 |
| 65 | 32.25 | 189 | 0.087 | 0.071 | 0.039 | 0.053 | 9 | 163 |
| 64 63 | 31.75 3125 | 189 | 0.085 | 0.071 | 0.039 | 0.053 | 9 | 163 |
| 63 | 31.25 30 | 133 | 0.082 | 0.072 | 0.039 | 0.052 | 6 | 115 |
| 62 | 30.75 | 134 | 0.079 | 0.072 | 0.040 | 0.052 | 6 | 115 |
| 61 | 30.25 | 134 | 0.077 | 0.072 | 0.040 | 0.052 | 6 | 115 |
| 60 59 | 29.75 | 134 | 0.074 | 0.072 | 0.040 | 0.052 | 6 | 115 |
| 59 58 | 29.25 | 134 | 0.072 | 0.072 | 0.040 | 0.052 | 6 | 116 |
| 58 57 | 28.75 | 134 | 0.069 | 0.072 | 0.041 | 0.052 | 6 | 116 |
| 57 <br> 56 | 28.25 27.75 | 134 135 | 0.067 0.065 | 0.072 0.072 | 0.041 0.041 | 0.052 | 6 | 116 |
| 55 | 27.25 | 135 | 0.062 | 0.072 | 0.041 | 0.051 | 6 | 116 116 |
| 54 | 26.75 | 135 | 0.060 | 0.072 | 0.041 | 0.051 | 6 | 116 |
| 53 | 26.25 | 135 | 0.058 | 0.072 | 0.041 | 0.051 | 6 | 116 |
| 52 | 25.75 | 135 | 0.056 | 0.071 | 0.042 | 0.051 | 6 | 117 |
| 51 | 25.25 | 135 | 0.054 | 0.071 | 0.042 | 0.051 | 6 | 117 |
| 50 49 | $\begin{aligned} & 24.75 \\ & 24.25 \end{aligned}$ | $\begin{aligned} & 135 \\ & 136 \end{aligned}$ | $\begin{aligned} & 0.051 \\ & 0.049 \end{aligned}$ | $\begin{aligned} & 0.071 \\ & 0.071 \end{aligned}$ | 0.042 0.042 | 0.051 0.051 | 6 6 | 117 117 |
| 48 | 23.75 | 136 | 0.047 | 0.071 | 0.042 | 0.050 | 6 | 117 117 |
| 47 | 23.25 | 136 | 0.045 | 0.071 | 0.042 | 0.050 | 6 | 117 |
| 46 | 22.75 | 136 | 0.043 | 0.071 | 0.042 | 0.050 | 6 | 117 |
| 45 | 22.25 | 136 | 0.042 | 0.070 | 0.042 | 0.050 | 6 | 118 |
| 44 | 21.75 | 136 | 0.040 | 0.070 | 0.042 | 0.050 | 6 | 118 |
| 43 | 21.25 | 137 | 0.038 | 0.070 | 0.041 | 0.050 | 6 | 118 |
| 42 | 20.75 | 137 | 0.036 | 0.070 | 0.041 | 0.049 | 6 | 118 |
| 41 | 20.25 | 137 | 0.034 | 0.069 | 0.041 | 0.049 | 6 | 118 |
| 40 | 19.75 | 137 | 0.033 | 0.069 | 0.041 | 0.049 | 6 | 118 |
| 39 | 19.25 | 137 | 0.031 | 0.068 | 0.041 | 0.049 | 6 | 118 |
| 38 | 18.75 | 137 | 0.030 | 0.068 | 0.040 | 0.048 | 6 | 119 |
| 37 | 18.25 | 138 | 0.028 | 0.068 | 0.040 | 0.048 | 6 | 119 |
| 36 35 | 17.75 | 138 | 0.026 | 0.067 | 0.040 | 0.048 | 6 | 119 |
| 34 | 17.25 | 138 | 0.025 | 0.066 | 0.039 | 0.048 | 6 | 119 |
| 33 | 16.75 | 138 | 0.024 | 0.066 | 0.039 | 0.047 | 6 | 119 |
| 32 | 15.75 | 138 | 0.021 | 0.065 | 0.038 | 0.047 0.047 | 6 6 | 119 |
| 31 | 15.25 | 139 | 0.020 | 0.064 | 0.038 | 0.046 | 6 | 119 119 |
| 30 | 14.75 | 139 | 0.018 | 0.063 | 0.037 | 0.046 | 5 | 120 |
| 29 | 14.25 | 139 | 0.017 | 0.062 | 0.037 | 0.045 | 5 | 120 |

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Site Number: 302494
Code: ANSI/TIA-222-G © CR007-2018 by ATC IP LLC. All rights reserved.
Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:38 PM
Customer: SPRINT NEXTEL

|  |  |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 28 |  |  |  |  |  |  |  |

Load Case (1.2+0.2Sds) * DL + E EMAM Seismic Equivalent Modal Analysis Method
Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{gathered} \mathrm{Pu} \\ \mathrm{FY}(-) \\ \text { (kips) } \\ \hline \end{gathered}$ | $\begin{aligned} & \text { Vu } \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ |  |  | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | $\begin{gathered} \text { phi } \\ \text { Pn } \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ \text { Vn } \\ \text { (kips) } \end{gathered}$ | $\begin{gathered} \text { phi } \\ \text { Tn } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{phi} \\ \mathrm{Mn} \\ \text { (ft-kips) } \end{gathered}$ | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -43.26 | -2.17 | 0.00 | -267.23 | 0.00 | 267.23 | 3,157 | 1,578.58 | 4,812.28 | 2,376.61 | 0.00 | 0.00 | 0.077 |
| 0.50 | -43.11 | -2.17 | 0.00 | -266.15 | 0.00 | 266.15 | 3,152.93 | 1,576.47 | 4,795.55 | 2,368.34 | 0.00 | 0.00 | 0.077 |
| 1.00 | -42.96 | -2.18 | 0.00 | -265.06 | 0.00 | 265.06 | 3,148.69 | 1,574.34 | 4,778.83 | 2,360.09 | 0.00 | -0.01 | 0.077 |
| 1.50 | -42.81 | -2.18 | 0.00 | -263.97 | 0.00 | 263.97 | 3,144.43 | 1,572.22 | 4,762.13 | 2,351.84 | 0.00 | -0.01 | 0.077 |
| 2.00 | -42.66 | -2.18 | 0.00 | -262.88 | 0.00 | 262.88 | 3,140.17 | 1,570.08 | 4,745.43 | 2,343.59 | 0.00 | -0.01 | 0.077 |
| 2.50 | -42.51 | -2.18 | 0.00 | -261.79 | 0.00 | 261.79 | 3,135.89 | 1,567.94 | 4,728.75 | 2,335.35 | 0.00 | -0.01 | 0.077 |
| 3.00 | -42.36 | -2.18 | 0.00 | -260.71 | 0.00 | 260.71 | 3,131.60 | 1,565.80 | 4,712.08 | 2,327.12 | 0.01 | -0.02 | 0.077 |
| 3.50 | -42.22 | -2.18 | 0.00 | -259.62 | 0.00 | 259.62 | 3,127.31 | 1,563.65 | 4,695.42 | 2,318.89 | 0.01 | -0.02 | 0.077 |
| 4.00 | -42.07 | -2.18 | 0.00 | -258.53 | 0.00 | 258.53 | 3,123.00 | 1,561.50 | 4,678.77 | 2,310.67 | 0.01 | -0.02 | 0.076 |
| 4.50 | -41.92 | -2.18 | 0.00 | -257.44 | 0.00 | 257.44 | 3,118.68 | 1,559.34 | 4,662.14 | 2,302.45 | 0.01 | -0.03 | 0.076 |
| 5.00 | -41.77 | -2.18 | 0.00 | -256.35 | 0.00 | 256.35 | 3,114.35 | 1,557.18 | 4,645.51 | 2,294.24 | 0.02 | -0.03 | 0.076 |
| 5.50 | -41.63 | -2.17 | 0.00 | -255.26 | 0.00 | 255.26 | 3,110.02 | 1,555.01 | 4,628.91 | 2,286.04 | 0.02 | -0.03 | 0.076 |
| 6.00 | -41.48 | -2.17 | 0.00 | -254.18 | 0.00 | 254.18 | 3,105.67 | 1,552.83 | 4,612.31 | 2,277.85 | 0.02 | -0.04 | 0.076 |
| 6.50 | -41.33 | -2.17 | 0.00 | -253.09 | 0.00 | 253.09 | 3,101.31 | 1,550.65 | 4,595.73 | 2,269.66 | 0.03 | -0.04 | 0.076 |
| 7.00 | -41.19 | -2.17 | 0.00 | -252.01 | 0.00 | 252.01 | 3,096.94 | 1,548.47 | 4,579.16 | 2,261.47 | 0.03 | -0.04 | 0.076 |
| 7.50 | -41.04 | -2.17 | 0.00 | -250.92 | 0.00 | 250.92 | 3,092.56 | 1,546.28 | 4,562.60 | 2,253.30 | 0.04 | -0.05 | 0.075 |
| 8.00 | -40.87 | -2.17 | 0.00 | -249.84 | 0.00 | 249.84 | 3,088.17 | 1,544.08 | 4,546.06 | 2,245.13 | 0.04 | -0.05 | 0.075 |
| 8.50 | -40.69 | -2.16 | 0.00 | -248.75 | 0.00 | 248.75 | 3,083.77 | 1,541.88 | 4,529.53 | 2,236.96 | 0.05 | -0.05 | 0.075 |
| 9.00 | -40.52 | -2.16 | 0.00 | -247.67 | 0.00 | 247.67 | 3,079.36 | 1,539.68 | 4,513.01 | 2,228.81 | 0.05 | -0.05 | 0.075 |
| 9.50 | -40.34 | -2.16 | 0.00 | -246.59 | 0.00 | 246.59 | 3,074.94 | 1,537.47 | 4,496.51 | 2,220.66 | 0.06 | -0.06 | 0.075 |
| 10.00 | -40.17 | -2.16 | 0.00 | -245.51 | 0.00 | 245.51 | 3,070.50 | 1,535.25 | 4,480.02 | 2,212.51 | 0.06 | -0.06 | 0.075 |
| 10.50 | -40.00 | -2.15 | 0.00 | -244.43 | 0.00 | 244.43 | 3,066.06 | 1,533.03 | 4,463.54 | 2,204.38 | 0.07 | -0.06 | 0.075 |
| 11.00 | -39.82 | -2.15 | 0.00 | -243.36 | 0.00 | 243.36 | 3,061.61 | 1,530.80 | 4,447.08 | 2,196.25 | 0.08 | -0.07 | 0.074 |
| 11.50 | -39.65 | -2.15 | 0.00 | -242.28 | 0.00 | 242.28 | 3,057.15 | 1,528.57 | 4,430.63 | 2,188.12 | 0.08 | -0.07 | 0.074 |
| 12.00 | -39.48 | -2.14 | 0.00 | -241.21 | 0.00 | 241.21 | 3,052.67 | 1,526.34 | 4,414.20 | 2,180.01 | 0.09 | -0.07 | 0.074 |
| 12.50 | -39.31 | -2.14 | 0.00 | -240.14 | 0.00 | 240.14 | 3,048.19 | 1,524.09 | 4,397.78 | 2,171.90 | 0.10 | -0.08 | 0.074 |
| 13.00 | -39.13 | -2.14 | 0.00 | -239.07 | 0.00 | 239.07 | 3,043.69 | 1,521.85 | 4,381.37 | 2,163.80 | 0.11 | -0.08 | 0.074 |
| 13.50 | -38.96 | -2.13 | 0.00 | -238.00 | 0.00 | 238.00 | 3,039.19 | 1,519.59 | 4,364.98 | 2,155.70 | 0.12 | -0.08 | 0.074 |
| 14.00 | -38.79 | -2.13 | 0.00 | -236.94 | 0.00 | 236.94 | 3,034.67 | 1,517.34 | 4,348.61 | 2,147.61 | 0.12 | -0.08 | 0.074 |
| 14.50 | -38.62 | -2.12 | 0.00 | -235.87 | 0.00 | 235.87 | 3,030.15 | 1,515.07 | 4,332.24 | 2,139.53 | 0.13 | -0.09 | 0.073 |
| 15.00 | -38.45 | -2.12 | 0.00 | -234.81 | 0.00 | 234.81 | 3,025.61 | 1,512.81 | 4,315.90 | 2,131.46 | 0.14 | -0.09 | 0.073 |
| 15.50 | -38.27 | -2.12 | 0.00 | -233.75 | 0.00 | 233.75 | 3,021.07 | 1,510.53 | 4,299.57 | 2,123.39 | 0.15 | -0.09 | 0.073 |
| 16.00 | -38.10 | -2.11 | 0.00 | -232.69 | 0.00 | 232.69 | 3,016.51 | 1,508.25 | 4,283.25 | 2,115.33 | 0.16 | -0.10 | 0.073 |
| 16.50 | -37.93 | -2.11 | 0.00 | -231.63 | 0.00 | 231.63 | 3,011.94 | 1,505.97 | 4,266.95 | 2,107.28 | 0.17 | -0.10 | 0.073 |
| 17.00 | -37.76 | -2.11 | 0.00 | -230.58 | 0.00 | 230.58 | 3,007.37 | 1,503.68 | 4,250.66 | 2,099.24 | 0.18 | -0.10 | 0.073 |
| 17.50 | -37.59 | -2.10 | 0.00 | -229.53 | 0.00 | 229.53 | 3,002.78 | 1,501.39 | 4,234.39 | 2,091.20 | 0.19 | -0.11 | 0.073 |
| 18.00 | -37.42 | -2.10 | 0.00 | -228.48 | 0.00 | 228.48 | 2,998.18 | 1,499.09 | 4,218.13 | 2,083.18 | 0.21 | -0.11 | 0.072 |
| 18.50 | -37.25 | -2.09 | 0.00 | -227.43 | 0.00 | 227.43 | 2,993.57 | 1,496.79 | 4,201.89 | 2,075.15 | 0.22 | -0.11 | 0.072 |
| 19.00 | -37.08 | -2.09 | 0.00 | -226.38 | 0.00 | 226.38 | 2,988.95 | 1,494.48 | 4,185.66 | 2,067.14 | 0.23 | -0.12 | 0.072 |
| 19.50 | -36.91 | -2.09 | 0.00 | -225.34 | 0.00 | 225.34 | 2,984.32 | 1,492.16 | 4,169.45 | 2,059.13 | 0.24 | -0.12 | 0.072 |
| 20.00 | -36.74 | -2.08 | 0.00 | -224.29 | 0.00 | 224.29 | 2,979.68 | 1,489.84 | 4,153.25 | 2,051.14 | 0.25 | -0.12 | 0.072 |
| 20.50 | -36.57 | -2.08 | 0.00 | -223.25 | 0.00 | 223.25 | 2,975.03 | 1,487.52 | 4,137.08 | 2,043.15 | 0.27 | -0.13 | 0.072 |
| 21.00 | -36.40 | -2.07 | 0.00 | -222.21 | 0.00 | 222.21 | 2,970.37 | 1,485.19 | 4,120.91 | 2,035.16 | 0.28 | -0.13 | 0.072 |
| 21.50 | -36.23 | -2.07 | 0.00 | -221.18 | 0.00 | 221.18 | 2,965.70 | 1,482.85 | 4,104.77 | 2,027.19 | 0.29 | -0.13 | 0.071 |
| 22.00 | -36.06 | -2.06 | 0.00 | -220.14 | 0.00 | 220.14 | 2,961.02 | 1,480.51 | 4,088.63 | 2,019.22 | 0.31 | -0.13 | 0.071 |
| 22.50 | -35.90 | -2.06 | 0.00 | -219.11 | 0.00 | 219.11 | 2,956.33 | 1,478.16 | 4,072.52 | 2,011.26 | 0.32 | -0.14 | 0.071 |
| 23.00 | -35.73 | -2.06 | 0.00 | -218.08 | 0.00 | 218.08 | 2,951.62 | 1,475.81 | 4,056.42 | 2,003.31 | 0.34 | -0.14 | 0.071 |
| 23.50 | -35.56 | -2.05 | 0.00 | -217.05 | 0.00 | 217.05 | 2,946.91 | 1,473.46 | 4,040.34 | 1,995.37 | 0.35 | -0.14 | 0.071 |
| 24.00 | -35.39 | -2.05 | 0.00 | -216.03 | 0.00 | 216.03 | 2,942.19 | 1,471.09 | 4,024.27 | 1,987.44 | 0.37 | -0.15 | 0.071 |
| 24.50 | -35.22 | -2.04 | 0.00 | -215.00 | 0.00 | 215.00 | 2,937.46 | 1,468.73 | 4,008.22 | 1,979.51 | 0.38 | -0.15 | 0.071 |
| 25.00 | -35.06 | -2.04 | 0.00 | -213.98 | 0.00 | 213.98 | 2,932.71 | 1,466.36 | 3,992.19 | 1,971.59 | 0.40 | -0.15 | 0.070 |
| 25.50 | -34.89 | -2.03 | 0.00 | -212.97 | 0.00 | 212.97 | 2,927.96 | 1,463.98 | 3,976.18 | 1,963.68 | 0.41 | -0.16 | 0.070 |
| 26.00 | -34.72 | -2.03 | 0.00 | -211.95 | 0.00 | 211.95 | 2,923.19 | 1,461.60 | 3,960.18 | 1,955.78 | 0.43 | -0.16 | 0.070 |
| 26.50 | -34.55 | -2.02 | 0.00 | -210.93 | 0.00 | 210.93 | 2,918.42 | 1,459.21 | 3,944.20 | 1,947.89 | 0.45 | -0.16 | 0.070 |
| 27.00 | -34.39 | -2.02 | 0.00 | -209.92 | 0.00 | 209.92 | 2,913.63 | 1,456.82 | 3,928.23 | 1,940.01 | 0.47 | -0.17 | 0.070 |
| 27.50 | -34.22 | -2.01 | 0.00 | -208.91 | 0.00 | 208.91 | 2,910.08 | 1,455.04 | 3,913.96 | 1,932.96 | 0.48 | -0.17 | 0.070 |

Customer: SPRINT NEXTEL

| 28.00 | -34.06 | -2.01 | 0.00 | -207.91 | 0.00 | 207.91 | 2,903.11 1,451.55 | 3,895.11 1,923.65 | 0.50 | -0.17 | 0.070 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 28.50 | -33.89 | -2.01 | 0.00 | -206.90 | 0.00 | 206.90 | 2,896.13 1,448.07 | 3,876.32 1,914.37 | 0.52 | -0.18 | 0.069 |
| 29.00 | -33.72 | -2.00 | 0.00 | -205.90 | 0.00 | 205.90 | 2,889.16 1,444.58 | 3,857.57 1,905.11 | 0.54 | -0.18 | 0.069 |
| 29.50 | -33.56 | -2.00 | 0.00 | -204.90 | 0.00 | 204.90 | 2,882.19 1,441.09 | 3,838.86 1,895.87 | 0.56 | -0.18 | 0.069 |
| 30.00 | -33.39 | -1.99 | 0.00 | -203.90 | 0.00 | 203.90 | 2,875.21 1,437.61 | 3,820.20 1,886.65 | 0.58 | -0.19 | 0.069 |
| 30.50 | -33.23 | -1.99 | 0.00 | -202.90 | 0.00 | 202.90 | 2,868.24 1,434.12 | 3,801.59 1,877.46 | 0.60 | -0.19 | 0.069 |
| 31.00 | -33.06 | -1.98 | 0.00 | -201.91 | 0.00 | 201.91 | 2,861.26 1,430.63 | 3,783.02 1,868.29 | 0.62 | -0.19 | 0.069 |
| 31.50 | -32.83 | -1.97 | 0.00 | -200.92 | 0.00 | 200.92 | 2,854.29 1,427.15 | 3,764.50 1,859.14 | 0.64 | -0.19 | 0.069 |
| 32.00 | -32.59 | -1.97 | 0.00 | -199.93 | 0.00 | 199.93 | 2,847.32 1,423.66 | 3,746.02 1,850.02 | 0.66 | -0.20 | 0.068 |
| 32.50 | -32.36 | -1.96 | 0.00 | -198.95 | 0.00 | 198.95 | 2,840.34 1,420.17 | 3,727.58 1,840.91 | 0.68 | -0.20 | 0.068 |
| 33.00 | -32.13 | -1.95 | 0.00 | -197.97 | 0.00 | 197.97 | 2,833.37 1,416.69 | 3,709.20 1,831.83 | 0.70 | -0.20 | 0.068 |
| 33.50 | -31.89 | -1.94 | 0.00 | -196.99 | 0.00 | 196.99 | 2,826.40 1,413.20 | 3,690.85 1,822.77 | 0.72 | -0.21 | 0.067 |
| 34.00 | -31.66 | -1.94 | 0.00 | -196.02 | 0.00 | 196.02 | 2,819.42 1,409.71 | 3,672.56 1,813.74 | 0.74 | -0.21 | 0.067 |
| 34.50 | -31.43 | -1.93 | 0.00 | -195.05 | 0.00 | 195.05 | 2,812.45 1,406.22 | 3,654.31 1,804.72 | 0.76 | -0.21 | 0.067 |
| 35.00 | -31.20 | -1.92 | 0.00 | -194.09 | 0.00 | 194.09 | 2,805.48 1,402.74 | 3,636.10 1,795.73 | 0.79 | -0.22 | 0.067 |
| 35.50 | -31.12 | -1.92 | 0.00 | -193.13 | 0.00 | 193.13 | 2,798.50 1,399.25 | 3,617.94 1,786.76 | 0.81 | -0.22 | 0.067 |
| 35.67 | -31.02 | -1.92 | 0.00 | -192.81 | 0.00 | 192.81 | 2,248.07 1,124.03 | 2,973.91 1,468.70 | 0.82 | -0.22 | 0.077 |
| 36.00 | -30.87 | -1.91 | 0.00 | -192.17 | 0.00 | 192.17 | 2,245.83 1,122.91 | 2,966.06 1,464.83 | 0.83 | -0.22 | 0.077 |
| 36.50 | -30.82 | -1.91 | 0.00 | -191.21 | 0.00 | 191.21 | 2,242.46 1,121.23 | 2,954.30 1,459.02 | 0.86 | -0.23 | 0.077 |
| 36.67 | -30.72 | -1.91 | 0.00 | -190.89 | 0.00 | 190.89 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.86 | -0.23 | 0.077 |
| 36.67 | -30.72 | -1.91 | 0.00 | -190.89 | 0.00 | 190.89 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.86 | -0.23 | 0.082 |
| 37.00 | -30.58 | -1.90 | 0.00 | -190.26 | 0.00 | 190.26 | 2,239.08 1,119.54 | 2,942.55 1,453.22 | 0.88 | -0.23 | 0.082 |
| 37.50 | -30.44 | -1.90 | 0.00 | -189.31 | 0.00 | 189.31 | 2,235.69 1,117.84 | 2,930.81 1,447.42 | 0.90 | -0.23 | 0.082 |
| 38.00 | -30.29 | -1.89 | 0.00 | -188.36 | 0.00 | 188.36 | 2,232.29 1,116.14 | 2,919.08 1,441.62 | 0.93 | -0.24 | 0.082 |
| 38.50 | -30.15 | -1.89 | 0.00 | -187.41 | 0.00 | 187.41 | 2,228.88 1,114.44 | 2,907.36 1,435.83 | 0.95 | -0.24 | 0.082 |
| 39.00 | -30.01 | -1.89 | 0.00 | -186.47 | 0.00 | 186.47 | 2,225.46 1,112.73 | 2,895.64 1,430.05 | 0.98 | -0.25 | 0.081 |
| 39.50 | -29.87 | -1.88 | 0.00 | -185.53 | 0.00 | 185.53 | 2,222.03 1,111.01 | 2,883.93 1,424.27 | 1.01 | -0.25 | 0.081 |
| 40.00 | -29.72 | -1.88 | 0.00 | -184.58 | 0.00 | 184.58 | 2,218.59 1,109.29 | 2,872.23 1,418.49 | 1.03 | -0.25 | 0.081 |
| 40.50 | -29.58 | -1.87 | 0.00 | -183.65 | 0.00 | 183.65 | 2,215.14 1,107.57 | 2,860.55 1,412.72 | 1.06 | -0.26 | 0.081 |
| 41.00 | -29.44 | -1.87 | 0.00 | -182.71 | 0.00 | 182.71 | 2,211.67 1,105.84 | 2,848.87 1,406.95 | 1.09 | -0.26 | 0.081 |
| 41.50 | -29.30 | -1.87 | 0.00 | -181.77 | 0.00 | 181.77 | 2,208.20 1,104.10 | 2,837.20 1,401.18 | 1.11 | -0.26 | 0.080 |
| 42.00 | -29.16 | -1.86 | 0.00 | -180.84 | 0.00 | 180.84 | 2,204.72 1,102.36 | 2,825.53 1,395.43 | 1.14 | -0.27 | 0.080 |
| 42.50 | -29.02 | -1.86 | 0.00 | -179.91 | 0.00 | 179.91 | 2,201.23 1,100.61 | 2,813.88 1,389.67 | 1.17 | -0.27 | 0.080 |
| 43.00 | -28.87 | -1.85 | 0.00 | -178.98 | 0.00 | 178.98 | 2,197.72 1,098.86 | 2,802.24 1,383.92 | 1.20 | -0.27 | 0.080 |
| 43.50 | -28.73 | -1.85 | 0.00 | -178.06 | 0.00 | 178.06 | 2,194.21 1,097.10 | 2,790.61 1,378.18 | 1.23 | -0.28 | 0.080 |
| 44.00 | -28.59 | -1.84 | 0.00 | -177.13 | 0.00 | 177.13 | 2,190.68 1,095.34 | 2,778.98 1,372.44 | 1.26 | -0.28 | 0.079 |
| 44.50 | -28.45 | -1.84 | 0.00 | -176.21 | 0.00 | 176.21 | 2,187.15 1,093.57 | 2,767.37 1,366.70 | 1.29 | -0.29 | 0.079 |
| 45.00 | -28.31 | -1.84 | 0.00 | -175.29 | 0.00 | 175.29 | 2,183.60 1,091.80 | 2,755.77 1,360.97 | 1.32 | -0.29 | 0.079 |
| 45.50 | -28.17 | -1.83 | 0.00 | -174.37 | 0.00 | 174.37 | 2,180.05 1,090.02 | 2,744.17 1,355.24 | 1.35 | -0.29 | 0.079 |
| 46.00 | -28.03 | -1.83 | 0.00 | -173.46 | 0.00 | 173.46 | 2,176.48 1,088.24 | 2,732.59 1,349.52 | 1.38 | -0.30 | 0.079 |
| 46.50 | -27.89 | -1.82 | 0.00 | -172.54 | 0.00 | 172.54 | 2,172.91 1,086.45 | 2,721.02 1,343.81 | 1.41 | -0.30 | 0.079 |
| 47.00 | -27.75 | -1.82 | 0.00 | -171.63 | 0.00 | 171.63 | 2,169.32 1,084.66 | 2,709.45 1,338.10 | 1.44 | -0.30 | 0.078 |
| 47.50 | -27.61 | -1.81 | 0.00 | -170.72 | 0.00 | 170.72 | 2,165.72 1,082.86 | 2,697.90 1,332.39 | 1.47 | -0.31 | 0.078 |
| 48.00 | -27.47 | -1.81 | 0.00 | -169.82 | 0.00 | 169.82 | 2,162.11 1,081.06 | 2,686.36 1,326.69 | 1.51 | -0.31 | 0.078 |
| 48.50 | -27.33 | -1.80 | 0.00 | -168.91 | 0.00 | 168.91 | 2,158.50 1,079.25 | 2,674.83 1,321.00 | 1.54 | -0.32 | 0.078 |
| 49.00 | -27.19 | -1.80 | 0.00 | -168.01 | 0.00 | 168.01 | 2,154.87 1,077.43 | 2,663.31 1,315.31 | 1.57 | -0.32 | 0.078 |
| 49.50 | -27.05 | -1.80 | 0.00 | -167.11 | 0.00 | 167.11 | 2,151.23 1,075.61 | 2,651.80 1,309.62 | 1.61 | -0.32 | 0.077 |
| 50.00 | -26.92 | -1.79 | 0.00 | -166.21 | 0.00 | 166.21 | 2,147.58 1,073.79 | 2,640.30 1,303.95 | 1.64 | -0.33 | 0.077 |
| 50.50 | -26.78 | -1.79 | 0.00 | -165.32 | 0.00 | 165.32 | 2,143.92 1,071.96 | 2,628.81 1,298.27 | 1.67 | -0.33 | 0.077 |
| 51.00 | -26.64 | -1.78 | 0.00 | -164.42 | 0.00 | 164.42 | 2,140.25 1,070.13 | 2,617.34 1,292.60 | 1.71 | -0.33 | 0.077 |
| 51.50 | -26.50 | -1.78 | 0.00 | -163.53 | 0.00 | 163.53 | 2,136.57 1,068.29 | 2,605.87 1,286.94 | 1.74 | -0.34 | 0.077 |
| 52.00 | -26.36 | -1.77 | 0.00 | -162.64 | 0.00 | 162.64 | 2,132.88 1,066.44 | 2,594.42 1,281.29 | 1.78 | -0.34 | 0.076 |
| 52.50 | -26.22 | -1.77 | 0.00 | -161.76 | 0.00 | 161.76 | 2,129.18 1,064.59 | 2,582.98 1,275.64 | 1.82 | -0.35 | 0.076 |
| 53.00 | -26.09 | -1.77 | 0.00 | -160.87 | 0.00 | 160.87 | 2,125.47 1,062.73 | 2,571.55 1,269.99 | 1.85 | -0.35 | 0.076 |
| 53.50 | -25.95 | -1.76 | 0.00 | -159.99 | 0.00 | 159.99 | 2,121.75 1,060.87 | 2,560.13 1,264.35 | 1.89 | -0.35 | 0.076 |
| 54.00 | -25.81 | -1.76 | 0.00 | -159.11 | 0.00 | 159.11 | 2,118.01 1,059.01 | 2,548.72 1,258.72 | 1.93 | -0.36 | 0.076 |
| 54.50 | -25.67 | -1.75 | 0.00 | -158.23 | 0.00 | 158.23 | 2,114.27 1,057.14 | 2,537.32 1,253.09 | 1.96 | -0.36 | 0.075 |
| 55.00 | -25.54 | -1.75 | 0.00 | -157.35 | 0.00 | 157.35 | 2,110.52 1,055.26 | 2,525.94 1,247.47 | 2.00 | -0.37 | 0.075 |
| 55.50 | -25.40 | -1.74 | 0.00 | -156.48 | 0.00 | 156.48 | 2,106.75 1,053.38 | 2,514.57 1,241.85 | 2.04 | -0.37 | 0.075 |
| 56.00 | -25.26 | -1.74 | 0.00 | -155.61 | 0.00 | 155.61 | 2,102.98 1,051.49 | 2,503.21 1,236.24 | 2.08 | -0.37 | 0.075 |
| 56.50 | -25.13 | -1.74 | 0.00 | -154.74 | 0.00 | 154.74 | 2,099.20 1,049.60 | 2,491.86 1,230.64 | 2.12 | -0.38 | 0.075 |
| 57.00 | -24.99 | -1.73 | 0.00 | -153.87 | 0.00 | 153.87 | 2,095.40 1,047.70 | 2,480.53 1,225.04 | 2.16 | -0.38 | 0.074 |
| 57.50 | -24.85 | -1.73 | 0.00 | -153.01 | 0.00 | 153.01 | 2,091.60 1,045.80 | 2,469.21 1,219.45 | 2.20 | -0.38 | 0.074 |
| 58.00 | -24.72 | -1.72 | 0.00 | -152.14 | 0.00 | 152.14 | 2,087.78 1,043.89 | 2,457.90 1,213.86 | 2.24 | -0.39 | 0.074 |

Customer: SPRINT NEXTEL

| 58.50 | -24.58 | -1.72 | 0.00 | -151.28 | 0.00 | 151.28 | 2,083.96 |  | 2,446.60 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 59.00 | -24.45 | -1.71 | 0.00 | -150.42 | 0.00 | 150.42 | 2,080.12 | 1,040.06 | 2,446.63 | 1,208.28 | 2.28 2.32 | -0.39 -0.40 | 0.074 0.074 |
| 59.50 | -24.31 | -1.71 | 0.00 | -149.56 | 0.00 | 149.56 | 2,076.27 | 1,038.14 | 2,424.04 | 1,197.14 | 2.36 | -0.40 | 0.074 0.073 |
| 60.00 | -24.17 | -1.71 | 0.00 | -148.71 | 0.00 | 148.71 | 2,072.41 | 1,036.21 | 2,412.79 | 1,191.58 | 2.41 | -0.40 | 0.073 0.073 |
| 60.50 | -24.04 | -1.70 | 0.00 | -147.86 | 0.00 | 147.86 | 2,068.55 | 1,034.27 | 2,401.54 | 1,186.03 | 2.41 | -0.40 | 0.073 0.073 |
| 61.00 | -23.90 | -1.70 | 0.00 | -147.00 | 0.00 | 147.00 | 2,064.67 | 1,032.33 | 2,390.31 | 1,180.48 | 2.49 | -0.41 | 0.073 0.073 |
| 61.50 | -23.77 | -1.70 | 0.00 | -146.15 | 0.00 | 146.15 | 2,060.78 | 1,030.39 | 2,379.09 | 1,174.94 | 2.53 | -0.42 | 0.073 |
| 62.00 | -23.63 | -1.69 | 0.00 | -145.31 | 0.00 | 145.31 | 2,056.88 | 1,028.44 | 2,367.88 | 1,169.41 | 2.58 | -0.42 | 0.072 |
| 62.50 63.00 | -23.50 | -1.69 | 0.00 | -144.46 | 0.00 | 144.46 | 2,052.97 | 1,026.49 | 2,356.69 | 1,163.88 | 2.62 | -0.42 | 0.072 |
| 63.00 63.50 | -23.36 -23.23 | -1.68 | 0.00 0.00 | -143.62 | 0.00 | 143.62 | 2,049.05 | 1,024.53 | 2,345.51 | 1,158.36 | 2.67 | -0.43 | 0.072 |
| 64.00 | -23.10 | -1.68 | 0.00 0.00 | -142.78 | 0.00 0.00 | 142.78 14193 | 2,045.12 | 1,022.56 | 2,334.35 | 1,152.85 | 2.71 | -0.43 | 0.072 |
| 64.50 | -22.96 | -1.67 | 0.00 | --141.10 | 0.00 0.00 | 141.93 141.10 | 2,041.18 | 1,020.59 | 2,323.20 | $1,147.34$ 1,14184 | 2.76 | -0.43 -0.44 | 0.071 |
| 65.00 | -22.83 | -1.67 | 0.00 | -140.26 | 0.00 | 140.26 | 2,033.27 | 1,016.64 | 2,300.94 | 1,141.84 | 2.80 2.85 | -0.44 -0.44 | 0.071 0.071 |
| 65.50 | -22.69 | -1.67 | 0.00 | -139.42 | 0.00 | 139.42 | 2,029.30 | 1,014.65 | 2,289.83 | 1,130.86 | 2.90 | -0.44 -0.45 | 0.071 0.071 |
| 66.00 66.50 | -22.56 | -1.67 | 0.00 | -138.59 | 0.00 | 138.59 | 2,025.32 | 1,012.66 | 2,278.74 | 1,125.38 | 2.94 | -0.45 | 0.071 |
| 66.50 67.00 | -22.43 | -1.66 | 0.00 | -137.76 | 0.00 | 137.76 | 2,021.33 | 1,010.66 | 2,267.65 | 1,119.91 | 2.99 | -0.45 | 0.070 |
| 67.00 | -22.29 | -1.66 | 0.00 | -136.93 | 0.00 | 136.93 | 2,016.97 | 1,008.48 | 2,256.19 | 1,114.25 | 3.04 | -0.46 | 0.070 |
| 67.50 | -22.16 | -1.66 | 0.00 | -136.10 | 0.00 | 136.10 | 2,011.16 | 1,005.58 | 2,243.13 | 1,107.80 | 3.09 | -0.46 | 0.070 |
| 68.00 | -22.03 | -1.65 | 0.00 | -135.27 | 0.00 | 135.27 | 2,005.34 | 1,002.67 | 2,230.12 | 1,101.37 | 3.13 | -0.47 | 0.070 |
| 68.50 | -21.90 | -1.65 | 0.00 | -134.44 | 0.00 | 134.44 | 1,999.53 | 999.77 | 2,217.14 | 1,094.96 | 3.18 | -0.47 | 0.070 |
| 69.00 | -21.76 | -1.65 | 0.00 | -133.61 | 0.00 | 133.61 | 1,993.72 | 996.86 | 2,204.19 | 1,088.57 | 3.23 | -0.47 | 0.070 |
| 69.50 | -21.63 -21.45 | -1.65 | 0.00 | -132.79 | 0.00 | 132.79 | 1,987.91 | 993.96 | 2,191.29 | 1,082.20 | 3.28 | -0.48 | 0.070 |
| 70.00 | -21.45 -21.27 | -1.64 | 0.00 | -131.96 | 0.00 | 131.96 | 1,982.10 | 991.05 | 2,178.42 | 1,075.84 | 3.33 | -0.48 | 0.069 |
| 70.50 | -21.27 | -1.64 | 0.00 | -131.14 | 0.00 | 131.14 | 1,976.29 | 988.14 | 2,165.59 | 1,069.51 | 3.38 | -0.49 | 0.068 |
| 71.00 | -21.10 | -1.64 | 0.00 | -130.32 | 0.00 | 130.32 | 1,970.48 | 985.24 | 2,152.80 | 1,063.19 | 3.44 | -0.49 | 0.068 |
| 71.50 | -20.92 | -1.64 | 0.00 | -129.50 | 0.00 | 129.50 | 1,964.67 | 982.33 | 2,140.05 | 1,056.89 | 3.49 | -0.49 | 0.068 |
| 72.00 | -20.74 | -1.63 | 0.00 | -128.68 | 0.00 | 128.68 | 1,958.85 | 979.43 | 2,127.34 | 1,050.61 | 3.54 | -0.50 | 0.068 |
| 72.50 73.00 | -20.57 | -1.63 | 0.00 | -127.87 | 0.00 | 127.87 | 1,953.04 | 976.52 | 2,114.66 | 1,044.35 | 3.59 | -0.50 | 0.067 |
| 73.00 73.33 | -20.45 -20.39 | -1.63 | 0.00 | -127.05 | 0.00 | 127.05 | 1,947.23 | 973.62 | 2,102.02 | 1,038.11 | 3.64 | -0.51 | 0.067 |
| 73.33 | -20.39 | -1.63 | 0.00 0.00 | -126.51 | 0.00 | 126.51 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 3.68 | -0.51 | 0.067 |
| 73.50 | -20.28 | -1.63 | 0.00 | -126.51 | 0.00 0.00 | 126.51 | 1,943.40 | 971.70 | 2,093.70 | 1,034.00 | 3.68 | -0.51 | 0.073 |
| 74.00 | -20.17 | -1.63 | 0.00 | -125.42 | 0.00 0.00 | 126.24 125.42 | 1,473.96 | 736.98 | 1,624.57 | 802.32 | 3.70 | -0.51 | 0.088 |
| 74.50 | -20.05 | -1.63 | 0.00 | -124.61 | 0.00 | 124.61 | 1,468.85 | 735.71 | 1,616.97 | 798.56 794.80 | 3.75 3.80 | -0.51 | 0.087 |
| 75.00 | -19.94 | -1.63 | 0.00 | -123.79 | 0.00 | 123.79 | 1,466.28 | 733.14 | 1,601.77 | 791.05 | 3.86 | -0.52 | 0.087 |
| 75.50 | -19.83 | -1.63 | 0.00 | -122.98 | 0.00 | 122.98 | 1,463.70 | 731.85 | 1,594.18 | 787.30 | 3.91 | -0.53 | 0.086 |
| 76.00 | -19.72 | -1.63 | 0.00 | -122.17 | 0.00 | 122.17 | 1,461.11 | 730.55 | 1,586.59 | 783.56 | 3.97 | -0.53 | 0.086 |
| 76.50 77.00 | -19.60 | -1.63 | 0.00 | -121.35 | 0.00 | 121.35 | 1,458.51 | 729.25 | 1,579.01 | 779.81 | 4.03 | -0.54 | 0.086 |
| 77.00 | -19.49 | -1.63 | 0.00 | -120.54 | 0.00 | 120.54 | 1,455.89 | 727.95 | 1,571.44 | 776.07 | 4.08 | -0.54 | 0.085 |
| 77.50 | -19.38 | -1.63 | 0.00 | -119.72 | 0.00 | 119.72 | 1,453.27 | 726.64 | 1,563.87 | 772.34 | 4.14 | -0.55 | 0.085 |
| 78.00 | -19.27 | -1.63 | 0.00 | -118.91 | 0.00 | 118.91 | 1,450.64 | 725.32 | 1,556.31 | 768.60 | 4.20 | -0.55 | 0.085 |
| 78.50 | -19.15 | -1.63 | 0.00 | -118.09 | 0.00 | 118.09 | 1,447.99 | 724.00 | 1,548.75 | 764.87 | 4.25 | -0.56 | 0.084 |
| 79.00 | -19.04 | -1.63 | 0.00 | -117.27 | 0.00 | 117.27 | 1,445.34 | 722.67 | 1,541.20 | 761.14 | 4.31 | -0.56 | 0.084 |
| 79.50 80.00 | -18.93 | -1.64 | 0.00 | -116.46 | 0.00 | 116.46 | 1,442.68 | 721.34 | 1,533.65 | 757.41 | 4.37 | -0.56 | 0.084 |
| 80.00 | -18.82 | -1.64 | 0.00 | -115.64 | 0.00 | 115.64 | 1,440.00 | 720.00 | 1,526.12 | 753.69 | 4.43 | -0.57 | 0.083 |
| 80.50 | -18.71 | -1.64 | 0.00 | -114.82 | 0.00 | 114.82 | 1,437.32 | 718.66 | 1,518.59 | 749.97 | 4.49 | -0.57 | 0.083 |
| 81.00 | -18.60 | -1.64 | 0.00 | -114.00 | 0.00 | 114.00 | 1,434.62 | 717.31 | 1,511.06 | 746.26 | 4.55 | -0.58 | 0.083 |
| 81.50 | -18.49 | -1.64 | 0.00 | -113.18 | 0.00 | 113.18 | 1,431.91 | 715.96 | 1,503.54 | 742.54 | 4.61 | -0.58 | 0.082 |
| 82.00 | -18.38 | -1.64 | 0.00 | -112.36 | 0.00 | 112.36 | 1,429.20 | 714.60 | 1,496.03 | 738.83 | 4.67 | -0.59 | 0.082 |
| 82.50 | -18.26 | -1.65 | 0.00 | -111.54 | 0.00 | 111.54 | 1,426.47 | 713.23 | 1,488.53 | 735.13 | 4.74 | -0.59 | 0.082 |
| 83.00 | -18.15 | -1.65 | 0.00 | -110.72 | 0.00 | 110.72 | 1,423.73 | 711.87 | 1,481.03 | 731.43 | 4.80 | -0.59 | 0.082 |
| 83.50 | -18.04 | -1.65 | 0.00 | -109.89 | 0.00 | 109.89 | 1,420.98 | 710.49 | 1,473.54 | 727.73 | 4.86 | -0.60 | 0.081 |
| 84.00 | -17.93 | -1.65 | 0.00 | -109.07 | 0.00 | 109.07 | 1,418.23 | 709.11 | 1,466.06 | 724.03 | 4.92 | -0.61 | 0.081 |
| 84.50 | -17.82 | -1.66 | 0.00 | -108.24 | 0.00 | 108.24 | 1,415.46 | 707.73 | 1,458.58 | 720.34 | 4.99 | -0.61 | 0.080 |
| 85.00 | -17.71 | -1.66 | 0.00 | -107.41 | 0.00 | 107.41 | 1,412.68 | 706.34 | 1,451.11 | 716.65 | 5.05 | -0.62 | 0.080 |
| 85.50 | -17.60 | -1.66 | 0.00 | -106.58 | 0.00 | 106.58 | 1,409.89 | 704.94 | 1,443.65 | 712.97 | 5.12 | -0.62 | 0.080 |
| 86.00 | -17.49 | -1.67 | 0.00 | -105.75 | 0.00 | 105.75 | 1,407.09 | 703.54 | 1,436.20 | 709.28 | 5.18 | -0.63 | 0.079 |
| 86.50 87.00 | -17.38 | -1.67 | 0.00 | -104.92 | 0.00 | 104.92 | 1,404.28 | 702.14 | 1,428.75 | 705.61 | 5.25 | -0.63 | 0.079 |
| 87.00 87.50 | -17.27 | -1.67 | 0.00 0.00 | -104.08 | 0.00 | 104.08 | 1,401.46 | 700.73 | 1,421.32 | 701.93 | 5.31 | -0.64 | 0.078 |
| 88.00 | -17.06 | -1.68 | 0.00 0.00 | -103.25 | 0.00 0.00 | 103.25 | 1,398.63 | 699.31 | 1,413.89 | 698.26 | 5.38 | -0.64 | 0.078 |
| 88.50 | -16.95 | -1.68 | 0.00 | -101.57 | 0.00 | 101.57 | 1,395.79 | 697.89 | 1,406.46 | 694.60 | 5.45 | -0.64 | 0.078 |
| 89.00 | -16.84 | -1.69 | 0.00 | -100.73 | 0.00 | 101.57 100.73 | 1,392.93 | 696.47 | 1,399.05 | 690.94 | 5.52 | -0.65 | 0.077 |
|  |  |  |  |  |  |  | 1,390.07 | 695.04 | 1,391.64 | 687.28 | 5.58 | -0.65 | 0.077 |

Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

| 89.50 | -16.73 | -1.69 | 0.00 | -99.89 | 0.00 | 99.89 | 1,387.20 | 693.60 | 1,384.25 | 683.63 | 5.65 | -0.66 | 0.077 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 90.00 | -16.62 | -1.69 | 0.00 | -99.04 | 0.00 | 99.04 | 1,384.32 | 692.16 | 1,376.86 | 679.98 | 5.72 | -0.66 | 0.076 |
| 90.50 | -16.51 | -1.70 | 0.00 | -98.20 | 0.00 | 98.20 | 1,381.42 | 690.71 | 1,369.48 | 676.33 | 5.79 | -0.67 | 0.076 |
| 91.00 | -16.40 | -1.70 | 0.00 | -97.35 | 0.00 | 97.35 | 1,378.52 | 689.26 | 1,362.10 | 672.69 | 5.86 | -0.67 | 0.075 |
| 91.50 | -16.29 | -1.70 | 0.00 | -96.50 | 0.00 | 96.50 | 1,375.61 | 687.80 | 1,354.74 | 669.06 | 5.93 | -0.68 | 0.075 |
| 92.00 | -16.19 | -1.71 | 0.00 | -95.65 | 0.00 | 95.65 | 1,372.68 | 686.34 | 1,347.39 | 665.42 | 6.00 | -0.68 | 0.075 |
| 92.50 | -16.08 | -1.71 | 0.00 | -94.79 | 0.00 | 94.79 | 1,369.75 | 684.87 | 1,340.04 | 661.80 | 6.08 | -0.69 | 0.074 |
| 93.00 | -15.97 | -1.72 | 0.00 | -93.94 | 0.00 | 93.94 | 1,366.80 | 683.40 | 1,332.70 | 658.17 | 6.15 | -0.69 | 0.074 |
| 93.50 | -15.86 | -1.72 | 0.00 | -93.08 | 0.00 | 93.08 | 1,363.85 | 681.92 | 1,325.38 | 654.55 | 6.22 | -0.70 | 0.073 |
| 94.00 94.50 | -15.75 | -1.72 | 0.00 | -92.22 | 0.00 | 92.22 | 1,360.88 | 680.44 | 1,318.06 | 650.94 | 6.22 6.29 | -0.70 | 0.073 0.073 |
| 94.50 95.00 | -15.65 | -1.73 | 0.00 | -91.36 | 0.00 | 91.36 | 1,357.90 | 678.95 | 1,310.75 | 647.33 | 6.29 6.37 | -0.70 | 0.073 0.072 |
| 95.00 95.50 | -15.54 | -1.73 -174 | 0.00 | -90.49 | 0.00 | 90.49 | 1,354.92 | 677.46 | 1,303.45 | 643.72 | 6.44 | -0.71 | 0.072 |
| 95.50 96.00 | -15.43 | -1.74 | 0.00 | -89.63 | 0.00 | 89.63 | 1,351.92 | 675.96 | 1,296.16 | 640.12 | 6.52 | -0.71 | 0.072 |
| 96.00 96.50 | -15.32 | -1.74 | 0.00 0.00 | -88.76 | 0.00 0.00 | 88.76 87.89 | 1,348.91 | 674.46 67295 | 1,288.88 | 636.53 | 6.59 | -0.72 | 0.071 |
| 97.00 | -15.11 | -1.75 | 0.00 | -87.89 | 0.00 0.00 | 87.89 87.02 | 1,345.89 | 672.95 | $1,281.61$ 1274.35 | 632.94 | 6.67 | -0.72 | 0.071 |
| 97.50 | -15.00 | -1.75 | 0.00 | -86.14 | 0.00 | 86.14 | 1,339.82 | 669.91 | 1,267.09 | 625.77 | 6.74 6.82 | -0.73 -0.73 | 0.070 0.070 |
| 98.00 | -14.90 | -1.76 | 0.00 | -85.27 | 0.00 | 85.27 | 1,336.78 | 668.39 | 1,259.85 | 622.19 | 6.90 | -0.74 | 0.069 |
| 98.50 | -14.79 | -1.76 | 0.00 | -84.39 | 0.00 | 84.39 | 1,333.72 | 666.86 | 1,252.62 | 618.62 | 6.97 | -0.74 | 0.069 |
| 99.00 | -14.68 | -1.76 | 0.00 | -83.51 | 0.00 | 83.51 | 1,330.65 | 665.32 | 1,245.40 | 615.06 | 7.05 | -0.75 | 0.068 |
| 99.50 | -14.58 | -1.77 | 0.00 | -82.63 | 0.00 | 82.63 | 1,327.57 | 663.78 | 1,238.19 | 611.50 | 7.13 | -0.75 | 0.068 |
| 100.00 | -14.47 | -1.77 | 0.00 | -81.74 | 0.00 | 81.74 | 1,324.47 | 662.24 | 1,230.99 | 607.94 | 7.21 | -0.76 | 0.067 |
| 100.50 | -14.36 | -1.78 | 0.00 | -80.86 | 0.00 | 80.86 | 1,321.37 | 660.69 | 1,223.80 | 604.39 | 7.29 | -0.76 | 0.067 |
| 101.00 | -14.26 | -1.78 | 0.00 | -79.97 | 0.00 | 79.97 | 1,318.26 | 659.13 | 1,216.62 | 600.84 | 7.37 | -0.76 | 0.066 |
| 101.50 | -14.15 | -1.78 | 0.00 | -79.08 | 0.00 | 79.08 | 1,315.14 | 657.57 | 1,209.45 | 597.30 | 7.45 | -0.77 | 0.066 |
| 102.00 | -14.05 | -1.79 | 0.00 | -78.19 | 0.00 | 78.19 | 1,312.01 | 656.00 | 1,202.30 | 593.77 | 7.53 | -0.77 | 0.066 |
| 102.50 | -13.94 | -1.79 | 0.00 | -77.29 | 0.00 | 77.29 | 1,308.86 | 654.43 | 1,195.15 | 590.24 | 7.61 | -0.78 | 0.065 |
| 103.00 | -13.84 | -1.79 | 0.00 | -76.40 | 0.00 | 76.40 | 1,305.71 | 652.86 | 1,188.02 | 586.72 | 7.69 | -0.78 | 0.064 |
| 103.50 104.00 | -13.73 -13.63 | -1.80 | 0.00 0.00 | -75.50 -7460 | 0.00 | 75.50 | 1,302.55 | 651.27 | 1,180.89 | 583.20 | 7.77 | -0.79 | 0.064 |
| 104.50 | -13.63 | -1.80 | 0.00 0.00 | -74.60 -73.70 | 0.00 | 74.60 | 1,299.37 | 649.69 | 1,173.78 | 579.69 | 7.86 | -0.79 | 0.063 |
| 105.00 | -13.42 | -1.81 | 0.00 | -72.80 | 0.00 | 72.80 | 1,296.19 | 648.09 | 1,166.68 | 576.18 572.68 | 7.94 8.02 | 0.80 | 23 |
| 105.50 | -13.31 | -1.81 | 0.00 | -71.90 | 0.00 | 71.90 | 1,288.98 | 644.49 | 1,151.78 | 568.82 | 8.11 | -0.80 | 0.062 |
| 106.00 | -13.21 | -1.81 | 0.00 | -70.99 | 0.00 | 70.99 | 1,284.33 | 642.16 | 1,143.44 | 564.70 | 8.19 | -0.81 | 0.061 |
| 106.50 | -13.10 | -1.82 | 0.00 | -70.08 | 0.00 | 70.08 | 1,279.68 | 639.84 | 1,135.13 | 560.60 | 8.28 | -0.81 | 0.061 |
| 107.00 | -13.00 | -1.82 | 0.00 | -69.18 | 0.00 | 69.18 | 1,275.03 | 637.51 | 1,126.85 | 556.51 | 8.36 | -0.82 | 0.061 |
| 107.50 | -12.89 | -1.82 | 0.00 | -68.27 | 0.00 | 68.27 | 1,270.38 | 635.19 | 1,118.60 | 552.44 | 8.45 | -0.82 | 0.060 |
| 108.00 | -12.79 | -1.82 | 0.00 | -67.36 | 0.00 | 67.36 | 1,265.73 | 632.87 | 1,110.38 | 548.38 | 8.53 | -0.83 | 0.060 |
| 108.50 | -12.69 | -1.83 | 0.00 | -66.45 | 0.00 | 66.45 | 1,261.08 | 630.54 | 1,102.19 | 544.33 | 8.62 | -0.83 | 0.059 |
| 109.00 | -12.58 | -1.83 | 0.00 | -65.53 | 0.00 | 65.53 | 1,256.43 | 628.22 | 1,094.04 | 540.30 | 8.71 | -0.83 | 0.059 |
| 109.50 | -12.48 | -1.83 | 0.00 | -64.62 | 0.00 | 64.62 | 1,251.78 | 625.89 | 1,085.91 | 536.29 | 8.80 | -0.84 | 0.058 |
| 110.00 | -12.39 | -1.83 | 0.00 | -63.71 | 0.00 | 63.71 | 1,247.14 | 623.57 | 1,077.81 | 532.29 | 8.88 | -0.84 | 0.058 |
| 110.00 | -12.39 | -1.83 | 0.00 | -63.71 | 0.00 | 63.71 | 853.24 | 426.62 | 741.79 | 366.34 | 8.88 | -0.84 | 0.000 |
| 110.50 | -12.31 | -1.83 | 0.00 | -62.79 | 0.00 | 62.79 | 851.46 | 425.73 | 737.46 | 364.21 | 8.97 | -0.85 | 0.080 |
| 111.00 | -12.22 | -1.83 | 0.00 | -61.87 | 0.00 | 61.87 | 849.67 | 424.84 | 733.15 | 362.07 | 9.06 | -0.85 | 0.080 |
| 111.50 | -12.13 | -1.84 | 0.00 | -60.96 | 0.00 | 60.96 | 847.87 | 423.94 | 728.83 | 359.94 | 9.15 | -0.86 | 0.079 |
| 112.00 | -12.05 | -1.84 | 0.00 | -60.04 | 0.00 | 60.04 | 846.07 | 423.03 | 724.52 | 357.81 | 9.24 | -0.86 | 0.078 |
| 112.50 | -11.96 | -1.84 | 0.00 | -59.12 | 0.00 | 59.12 | 844.25 | 422.12 | 720.21 | 355.68 | 9.33 | -0.87 | 0.077 |
| 113.00 | -11.87 | -1.84 | 0.00 | -58.20 | 0.00 | 58.20 | 842.42 | 421.21 | 715.90 | 353.56 | 9.42 | -0.87 | 0.076 |
| 113.50 | -11.79 | -1.84 | 0.00 | -57.28 | 0.00 | 57.28 | 840.58 | 420.29 | 711.60 | 351.43 | 9.51 | -0.88 | 0.075 |
| 114.00 | -11.70 | -1.84 | 0.00 | -56.36 | 0.00 | 56.36 | 838.73 | 419.36 | 707.30 | 349.31 | 9.61 | -0.88 | 0.074 |
| 114.50 | -11.62 | -1.84 | 0.00 | -55.44 | 0.00 | 55.44 | 836.87 | 418.43 | 703.00 | 347.19 | 9.70 | -0.89 | 0.073 |
| 115.00 | -11.53 | -1.84 | 0.00 | -54.52 | 0.00 | 54.52 | 834.99 | 417.50 | 698.71 | 345.06 | 9.79 | -0.89 | 0.072 |
| 115.50 | -11.45 | -1.84 | 0.00 | -53.60 | 0.00 | 53.60 | 833.11 | 416.56 | 694.42 | 342.95 | 9.89 | -0.90 | 0.071 |
| 116.00 | -11.36 | -1.84 | 0.00 | -52.68 | 0.00 | 52.68 | 831.22 | 415.61 | 690.13 | 340.83 | 9.98 | -0.90 | 0.070 |
| 116.50 | -11.31 | -1.84 | 0.00 | -51.76 | 0.00 | 51.76 | 829.32 | 414.66 | 685.85 | 338.71 | 10.08 | -0.91 | 0.070 |
| 116.50 117.00 | -11.31 | -1.84 -1.84 | 0.00 | -51.76 | 0.00 | 51.76 | 829.32 | 414.66 | 685.85 | 338.71 | 10.08 | -0.91 | 0.166 |
| 117.00 117.50 | -11.25 | -1.84 -1.84 | 0.00 | -50.84 | 0.00 | 50.84 | 827.41 | 413.70 | 681.57 | 336.60 | 10.17 | -0.91 | 0.165 |
| 117.50 118.00 | -11.20 | -1.84 | 0.00 | -49.92 | 0.00 | 49.92 | 825.48 | 412.74 | 677.29 | 334.49 | 10.27 | -0.92 | 0.163 |
| 118.50 | -11.14 | -1.84 | 0.00 0.00 | -49.00 | 0.00 | 49.00 | 823.55 | 411.77 | 673.02 | 332.38 | 10.37 | -0.94 | 0.161 |
| 119.00 | -11.04 | -1.85 | 0.00 | -48.07 | 0.00 0.00 | 48.07 47.15 | 821.61 | 410.80 | 668.75 | 330.27 | 10.46 | -0.95 | 0.159 |
| 119.50 | -10.98 | -1.85 | 0.00 | -46.23 | 0.00 | 46.23 | 817.69 | 409.83 | 664.49 | 328.17 | 10.56 | -0.96 | 0.157 0.155 |
| 120.00 | -10.93 | -1.85 | 0.00 | -45.30 | 0.00 | 45.30 | 815.71 | 407.86 | 655.98 | 323.96 | 10.77 | -0.98 | 0.153 |

Customer: SPRINT NEXTEL

| 120.50 | -10.88 | -1.85 | 0.00 | -44.38 | 0.00 | 44.38 | 813.73 | 406.86 | 651.73 | 321.87 | 10.87 | -0.99 | 0.151 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 121.00 | -10.82 | -1.85 | 0.00 | -43.46 | 0.00 | 43.46 | 811.73 | 405.86 | 647.49 | 319.77 | 10.98 | -1.00 | 0.149 |
| 121.50 | -10.77 | -1.85 | 0.00 | -42.53 | 0.00 | 42.53 | 809.72 | 404.86 | 643.25 | 317.68 | 11.08 | -1.01 | 0.147 |
| 122.00 | -10.72 | -1.85 | 0.00 | -41.61 | 0.00 | 41.61 | 807.71 | 403.85 | 639.01 | 315.58 | 11.19 | -1.03 | 0.145 |
| 122.50 | -10.67 | -1.85 | 0.00 | -40.68 | 0.00 | 40.68 | 805.68 | 402.84 | 634.78 | 313.49 | 11.30 | -1.04 | 0.143 |
| 123.00 | -10.61 | -1.85 | 0.00 | -39.76 | 0.00 | 39.76 | 803.64 | 401.82 | 630.56 | 311.41 | 11.40 | -1.05 | 0.141 |
| 123.50 | -10.56 | -1.85 | 0.00 | -38.84 | 0.00 | 38.84 | 801.59 | 400.80 | 626.34 | 309.32 | 11.52 | -1.06 | 0.139 |
| 124.00 | -10.51 | -1.85 | 0.00 | -37.91 | 0.00 | 37.91 | 799.54 | 399.77 | 622.12 | 307.24 | 11.63 | -1.07 | 0.137 |
| 124.50 | -10.46 | -1.84 | 0.00 | -36.99 | 0.00 | 36.99 | 797.47 | 398.73 | 617.91 | 305.16 | 11.74 | -1.08 | 0.134 |
| 125.00 | -10.40 | -1.84 | 0.00 | -36.07 | 0.00 | 36.07 | 795.39 | 397.69 | 613.71 | 303.09 | 11.85 | -1.09 | 0.132 |
| 125.50 | -10.35 | -1.84 | 0.00 | -35.15 | 0.00 | 35.15 | 793.30 | 396.65 | 609.51 | 301.01 | 11.97 | -1.10 | 0.130 |
| 126.00 | -10.30 | -1.84 | 0.00 | -34.22 | 0.00 | 34.22 | 791.20 | 395.60 | 605.32 | 298.94 | 12.08 | -1.11 | 0.128 |
| 126.50 | -10.25 | -1.84 | 0.00 | -33.30 | 0.00 | 33.30 | 789.09 | 394.54 | 601.13 | 296.88 | 12.20 | -1.12 | 0.125 |
| 127.00 | -10.20 | -1.84 | 0.00 | -32.39 | 0.00 | 32.39 | 786.97 | 393.48 | 596.95 | 294.81 | 12.32 | -1.13 | 0.123 |
| 127.50 | -10.14 | -1.83 | 0.00 | -31.47 | 0.00 | 31.47 | 784.84 | 392.42 | 592.78 | 292.75 | 12.44 | -1.14 | 0.120 |
| 128.00 | -10.09 | -1.83 | 0.00 | -30.55 | 0.00 | 30.55 | 782.69 | 391.35 | 588.61 | 290.69 | 12.55 | -1.15 | 0.118 |
| 128.50 | -10.04 | -1.83 | 0.00 | -29.63 | 0.00 | 29.63 | 780.54 | 390.27 | 584.44 | 288.64 | 12.68 | -1.16 | 0.116 |
| 129.00 | -9.99 | -1.83 | 0.00 | -28.72 | 0.00 | 28.72 | 778.38 | 389.19 | 580.29 | 286.58 | 12.80 | -1.16 | 0.113 |
| 129.50 | -9.94 | -1.82 | 0.00 | -27.80 | 0.00 | 27.80 | 776.21 | 388.10 | 576.14 | 284.53 | 12.92 | -1.17 | 0.111 |
| 130.00 | -9.89 | -1.82 | 0.00 | -26.89 | 0.00 | 26.89 | 774.02 | 387.01 | 572.00 | 282.49 | 13.04 | -1.18 | 0.108 |
| 130.50 | -9.84 | -1.82 | 0.00 | -25.98 | 0.00 | 25.98 | 771.83 | 385.91 | 567.86 | 280.44 | 13.17 | -1.19 | 0.105 |
| 131.00 | -5.85 | -1.43 | 0.00 | -25.07 | 0.00 | 25.07 | 769.63 | 384.81 | 563.73 | 278.40 | 13.29 | -1.20 | 0.098 |
| 131.50 | -5.81 | -1.43 | 0.00 | -24.36 | 0.00 | 24.36 | 767.41 | 383.71 | 559.60 | 276.37 | 13.42 | -1.21 | 0.096 |
| 132.00 | -5.76 | -1.42 | 0.00 | -23.64 | 0.00 | 23.64 | 765.19 | 382.59 | 555.49 | 274.33 | 13.54 | -1.21 | 0.094 |
| 132.50 | -5.72 | -1.42 | 0.00 | -22.93 | 0.00 | 22.93 | 762.95 | 381.48 | 551.38 | 272.31 | 13.67 | -1.22 | 0.092 |
| 133.00 | -5.67 | -1.42 | 0.00 | -22.22 | 0.00 | 22.22 | 760.71 | 380.35 | 547.28 | 270.28 | 13.80 | -1.23 | 0.090 |
| 133.50 | -5.63 | -1.41 | 0.00 | -21.51 | 0.00 | 21.51 | 758.45 | 379.23 | 543.18 | 268.26 | 13.93 | -1.24 | 0.088 |
| 134.00 | -5.59 | -1.41 | 0.00 | -20.81 | 0.00 | 20.81 | 756.18 | 378.09 | 539.09 | 266.24 | 14.06 | -1.24 | 0.086 |
| 134.50 | -5.55 | -1.40 | 0.00 | -20.10 | 0.00 | 20.10 | 753.91 | 376.95 | 535.01 | 264.22 | 14.19 | -1.25 | 0.083 |
| 135.00 | -5.50 | -1.40 | 0.00 | -19.40 | 0.00 | 19.40 | 751.62 | 375.81 | 530.94 | 262.21 | 14.32 | -1.26 | 0.081 |
| 135.50 | -5.46 | -1.39 | 0.00 | -18.70 | 0.00 | 18.70 | 749.32 | 374.66 | 526.87 | 260.20 | 14.45 | -1.27 | 0.079 |
| 136.00 | -5.42 | -1.39 | 0.00 | -18.01 | 0.00 | 18.01 | 747.01 | 373.51 | 522.82 | 258.20 | 14.59 | -1.27 | 0.077 |
| $136.50$ | -5.37 | -1.38 | 0.00 | -17.31 | 0.00 | 17.31 | 744.70 | 372.35 | 518.77 | 256.20 | 14.72 | -1.28 | 0.075 |
| 137.00 | -5.33 | -1.38 | 0.00 | -16.62 | 0.00 | 16.62 | 742.37 | 371.18 | 514.72 | 254.20 | 14.86 | -1.29 | 0.073 |
| 137.50 | -5.29 | -1.37 | 0.00 | -15.93 | 0.00 | 15.93 | 740.03 | 370.01 | 510.69 | 252.21 | 14.99 | -1.29 | 0.070 |
| 138.00 | -5.25 | -1.36 | 0.00 | -15.25 | 0.00 | 15.25 | 737.68 | 368.84 | 506.66 | 250.22 | 15.13 | -1.30 | 0.068 |
| 138.50 | -5.21 | -1.36 | 0.00 | -14.57 | 0.00 | 14.57 | 735.32 | 367.66 | 502.65 | 248.24 | 15.26 | -1.30 | 0.066 |
| 139.00 | -5.16 | -1.35 | 0.00 | -13.89 | 0.00 | 13.89 | 732.95 | 366.47 | 498.64 | 246.26 | 15.40 | -1.31 | 0.063 |
| 139.50 | -5.12 | -1.35 | 0.00 | -13.21 | 0.00 | 13.21 | 730.57 | 365.28 | 494.64 | 244.28 | 15.54 | -1.32 | 0.061 |
| 140.00 | -5.08 | -1.34 | 0.00 | -12.54 | 0.00 | 12.54 | 728.18 | 364.09 | 490.64 | 242.31 | 15.68 | -1.32 | 0.059 |
| 140.50 | -5.04 | -1.33 | 0.00 | -11.87 | 0.00 | 11.87 | 725.44 | 362.72 | 486.44 | 240.23 | 15.81 | -1.33 | 0.056 |
| 141.00 | -4.92 | -1.31 | 0.00 | -11.20 | 0.00 | 11.20 | 721.95 | 360.98 | 481.74 | 237.92 | 15.95 | -1.33 | 0.054 |
| 141.50 | -4.88 | -1.30 | 0.00 | -10.55 | 0.00 | 10.55 | 718.47 | 359.23 | 477.08 | 235.61 | 16.09 | -1.34 | 0.052 |
| 142.00 | -4.84 | -1.30 | 0.00 | -9.90 | 0.00 | 9.90 | 714.98 | 357.49 | 472.43 | 233.32 | 16.23 | -1.34 | 0.049 |
| 142.50 | -4.80 | -1.29 | 0.00 | -9.25 | 0.00 | 9.25 | 711.49 | 355.75 | 467.81 | 231.03 | 16.37 | -1.34 | 0.047 |
| 143.00 | -4.77 | -1.28 | 0.00 | -8.60 | 0.00 | 8.60 | 708.01 | 354.00 | 463.21 | 228.76 | 16.51 | -1.35 | 0.044 |
| 143.50 | -4.73 | -1.28 | 0.00 | -7.96 | 0.00 | 7.96 | 704.52 | 352.26 | 458.63 | 226.50 | 16.66 | -1.35 | 0.042 |
| 144.00 | -4.69 | -1.27 | 0.00 | -7.32 | 0.00 | 7.32 | 701.03 | 350.52 | 454.07 | 224.25 | 16.80 | -1.36 | 0.039 |
| 144.50 | -4.65 | -1.26 | 0.00 | -6.69 | 0.00 | 6.69 | 697.55 | 348.77 | 449.54 | 222.01 | 16.94 | -1.36 | 0.037 |
| 145.00 | -4.61 | -1.25 | 0.00 | -6.06 | 0.00 | 6.06 | 694.06 | 347.03 | 445.03 | 219.78 | 17.08 | -1.36 | 0.034 |
| 145.50 | -4.58 | -1.24 | 0.00 | -5.43 | 0.00 | 5.43 | 690.57 | 345.29 | 440.55 | 217.57 | 17.23 | -1.36 | 0.032 |
| 146.00 | -4.54 | -1.23 | 0.00 | -4.81 | 0.00 | 4.81 | 687.09 | 343.54 | 436.08 | 215.36 | 17.37 | -1.37 | 0.029 |
| 146.50 | -4.50 | -1.23 | 0.00 | -4.19 | 0.00 | 4.19 | 683.60 | 341.80 | 431.64 | 213.17 | 17.51 | -1.37 | 0.026 |
| 147.00 | -4.46 | -1.22 | 0.00 | -3.58 | 0.00 | 3.58 | 680.11 | 340.06 | 427.22 | 210.99 | 17.66 | -1.37 | 0.024 |
| 147.50 | -4.43 | -1.21 | 0.00 | -2.97 | 0.00 | 2.97 | 676.63 | 338.31 | 422.83 | 208.82 | 17.80 | -1.37 | 0.021 |
| 148.00 | -4.39 | -1.20 | 0.00 | -2.37 | 0.00 | 2.37 | 673.14 | 336.57 | 418.45 | 206.66 | 17.94 | -1.37 | 0.018 |
| 148.50 | -4.35 | -1.19 | 0.00 | -1.77 | 0.00 | 1.77 | 669.65 | 334.83 | 414.10 | 204.51 | 18.09 | -1.38 | 0.015 |
| 149.00 | -4.32 | -1.18 | 0.00 | -1.17 | 0.00 | 1.17 | 666.16 | 333.08 | 409.78 | 202.37 | 18.23 | -1.38 | 0.012 |
| 149.50 | -4.28 | -1.17 | 0.00 | -0.58 | 0.00 | 0.58 | 662.68 | 331.34 | 405.47 | 200.25 | 18.38 | -1.38 | 0.009 |
| 150.00 | 0.00 | -1.07 | 0.00 | 0.00 | 0.00 | 0.00 | 659.19 | 329.60 | 401.19 | 198.13 | 18.52 | -1.38 | 0.000 |

Site Name: Hddm - Haddam, CT
Engineering Number: OAA712589_C3_05
4/24/2018 5:54:38 PM
Customer: SPRINT NEXTEL

Load Case (0.9-0.2Sds) * DL + E EMAM Seismic (Reduced DL) Equivalent Modal Analysis Method Calculated Forces

| Seg <br> Elev <br> (ft) | $\begin{gathered} \text { Pu } \\ \text { FY (-) } \\ \text { (kips) } \end{gathered}$ | $\begin{aligned} & \mathrm{Vu} \\ & \text { FX (-) } \\ & \text { (kips) } \end{aligned}$ | $\begin{gathered} \text { Tu } \\ \text { MY } \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MZ} \\ \text { (ft-kips) } \end{gathered}$ | $\begin{gathered} \mathrm{Mu} \\ \mathrm{MX} \\ \text { (ft-kips) } \end{gathered}$ | Resultant Moment (ft-kips) | phi phi <br> Pn Vn <br> (kips) (kips) | phi phi <br> Tn Mn <br> (ft-kips) (ft-kips) | Total Deflect (in) | Rotation (deg) | Ratio |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0.00 | -30.15 | -2.17 | 0.00 | -260.04 | 0.00 | 260.04 | 3,157.17 1,578.58 | 4,812.28 2,376.61 | 0.00 | 0.00 | 0.073 |
| 0.50 | -30.04 | -2.17 | 0.00 | -258.95 | 0.00 | 258.95 | 3,152.93 1,576.47 | 4,795.55 2,368.34 | 0.00 | 0.00 | 0.073 |
| 1.00 | -29.94 | -2.17 | 0.00 | -257.87 | 0.00 | 257.87 | 3,148.69 1,574.34 | 4,778.83 2,360.09 | 0.00 | -0.01 | 0.073 |
| 1.50 | -29.83 | -2.17 | 0.00 | -256.78 | 0.00 | 256.78 | 3,144.43 1,572.22 | 4,762.13 2,351.84 | 0.00 | -0.01 | 0.073 |
| 2.00 | -29.73 | -2.17 | 0.00 | -255.70 | 0.00 | 255.70 | 3,140.17 1,570.08 | 4,745.43 2,343.59 | 0.00 | -0.01 | 0.072 |
| 2.50 | -29.63 | -2.17 | 0.00 | -254.61 | 0.00 | 254.61 | 3,135.89 1,567.94 | 4,728.75 2,335.35 | 0.00 | -0.01 | 0.072 |
| 3.00 | -29.52 | -2.17 | 0.00 | -253.52 | 0.00 | 253.52 | 3,131.60 1,565.80 | 4,712.08 2,327.12 | 0.01 | -0.02 | 0.072 |
| 3.50 | -29.42 | -2.17 | 0.00 | -252.44 | 0.00 | 252.44 | 3,127.31 1,563.65 | 4,695.42 2,318.89 | 0.01 | -0.02 | 0.072 |
| 4.00 | -29.32 | -2.17 | 0.00 | -251.35 | 0.00 | 251.35 | 3,123.00 1,561.50 | 4,678.77 2,310.67 | 0.01 | -0.02 | 0.072 |
| 4.50 | -29.21 | -2.17 | 0.00 | -250.27 | 0.00 | 250.27 | 3,118.68 1,559.34 | 4,662.14 2,302.45 | 0.01 | -0.03 | 0.072 |
| 5.00 | -29.11 | -2.17 | 0.00 | -249.19 | 0.00 | 249.19 | 3,114.35 1,557.18 | 4,645.51 2,294.24 | 0.02 | -0.03 | 0.072 |
| 5.50 | -29.01 | -2.16 | 0.00 | -248.10 | 0.00 | 248.10 | 3,110.02 1,555.01 | 4,628.91 2,286.04 | 0.02 | -0.03 | 0.072 |
| 6.00 | -28.91 | -2.16 | 0.00 | -247.02 | 0.00 | 247.02 | 3,105.67 1,552.83 | 4,612.31 2,277.85 | 0.02 | -0.03 | 0.071 |
| 6.50 | -28.80 | -2.16 | 0.00 | -245.94 | 0.00 | 245.94 | 3,101.31 1,550.65 | 4,595.73 2,269.66 | 0.03 | -0.04 | 0.071 |
| 7.00 | -28.70 | -2.16 | 0.00 | -244.86 | 0.00 | 244.86 | 3,096.94 1,548.47 | 4,579.16 2,261.47 | 0.03 | -0.04 | 0.071 |
| 7.50 | -28.60 | -2.16 | 0.00 | -243.78 | 0.00 | 243.78 | 3,092.56 1,546.28 | 4,562.60 2,253.30 | 0.03 | -0.04 | 0.071 |
| 8.00 | -28.48 | -2.15 | 0.00 | -242.70 | 0.00 | 242.70 | 3,088.17 1,544.08 | 4,546.06 2,245.13 | 0.04 | -0.05 | 0.071 |
| 8.50 | -28.36 | -2.15 | 0.00 | -241.62 | 0.00 | 241.62 | 3,083.77 1,541.88 | 4,529.53 2,236.96 | 0.04 | -0.05 | 0.071 |
| 9.00 | -28.24 | -2.15 | 0.00 | -240.55 | 0.00 | 240.55 | 3,079.36 1,539.68 | 4,513.01 2,228.81 | 0.05 | -0.05 | 0.071 |
| 9.50 | -28.12 | -2.14 | 0.00 | -239.48 | 0.00 | 239.48 | 3,074.94 1,537.47 | 4,496.51 2,220.66 | 0.06 | -0.06 | 0.070 |
| 10.00 | -27.99 | -2.14 | 0.00 | -238.40 | 0.00 | 238.40 | 3,070.50 1,535.25 | 4,480.02 2,212.51 | 0.06 | -0.06 | 0.070 |
| 10.50 | -27.87 | -2.14 -2.13 | 0.00 | -237.33 | 0.00 | 237.33 | 3,066.06 1,533.03 | 4,463.54 2,204.38 | 0.07 | -0.06 | 0.070 |
| 11.50 | -27.75 | -2.13 | 0.00 | -236.27 | 0.00 | 236.27 | 3,061.61 1,530.80 | 4,447.08 2,196.25 | 0.07 | -0.06 | 0.070 |
| 12.00 | -27.51 | -2.12 | 0.00 | -234.14 | 0.00 | 234.14 | 3,052.67 1,526.34 | $4,430.63$ $4,414.20$ $2,188.12$ | 9 | . 7 | 0.070 0.070 |
| 12.50 | -27.39 | -2.12 | 0.00 | -233.07 | 0.00 | 233.07 | 3,048.19 1,524.09 | 4,397.78 2,171.90 | 0.10 | -0.07 | 0.070 |
| 13.00 | -27.27 | -2.12 | 0.00 | -232.01 | 0.00 | 232.01 | 3,043.69 1,521.85 | 4,381.37 2,163.80 | 0.10 | -0.08 | 0.070 |
| 13.50 | -27.15 | -2.11 | 0.00 | -230.96 | 0.00 | 230.96 | 3,039.19 1,519.59 | 4,364.98 2,155.70 | 0.11 | -0.08 | 0.069 |
| 14.00 | -27.03 | -2.11 | 0.00 | -229.90 | 0.00 | 229.90 | 3,034.67 1,517.34 | 4,348.61 2,147.61 | 0.12 | -0.08 | 0.069 |
| 14.50 | -26.91 | -2.10 | 0.00 | -228.85 | 0.00 | 228.85 | 3,030.15 1,515.07 | 4,332.24 2,139.53 | 0.13 | -0.09 | 0.069 |
| 15.00 | -26.79 | -2.10 | 0.00 | -227.79 | 0.00 | 227.79 | 3,025.61 1,512.81 | 4,315.90 2,131.46 | 0.14 | -0.09 | 0.069 |
| 15.50 | -26.67 | -2.10 | 0.00 | -226.74 | 0.00 | 226.74 | 3,021.07 1,510.53 | 4,299.57 2,123.39 | 0.15 | -0.09 | 0.069 |
| 16.00 | -26.55 | -2.09 | 0.00 | -225.70 | 0.00 | 225.70 | 3,016.51 1,508.25 | 4,283.25 2,115.33 | 0.16 | -0.09 | 0.069 |
| 16.50 | -26.43 | -2.09 | 0.00 | -224.65 | 0.00 | 224.65 | 3,011.94 1,505.97 | 4,266.95 2,107.28 | 0.17 | -0.10 | 0.069 |
| 17.00 | -26.32 | -2.08 | 0.00 | -223.61 | 0.00 | 223.61 | 3,007.37 1,503.68 | 4,250.66 2,099.24 | 0.18 | -0.10 | 0.068 |
| 17.50 | -26.20 | -2.08 | 0.00 | -222.57 | 0.00 | 222.57 | 3,002.78 1,501.39 | 4,234.39 2,091.20 | 0.19 | -0.10 | 0.068 |
| 18.00 | -26.08 | -2.07 | 0.00 | -221.53 | 0.00 | 221.53 | 2,998.18 1,499.09 | 4,218.13 2,083.18 | 0.20 | -0.11 | 0.068 |
| 18.50 | -25.96 | -2.07 | 0.00 | -220.49 | 0.00 | 220.49 | 2,993.57 1,496.79 | 4,201.89 2,075.15 | 0.21 | -0.11 | 0.068 |
| 19.00 | -25.84 | -2.06 | 0.00 | -219.46 | 0.00 | 219.46 | 2,988.95 1,494.48 | 4,185.66 2,067.14 | 0.22 | -0.11 | 0.068 |
| 19.50 | -25.72 | -2.06 | 0.00 | -218.43 | 0.00 | 218.43 | 2,984.32 1,492.16 | 4,169.45 2,059.13 | 0.23 | -0.12 | 0.068 |
| 20.00 | -25.60 | -2.05 | 0.00 | -217.40 | 0.00 | 217.40 | 2,979.68 1,489.84 | 4,153.25 2,051.14 | 0.25 | -0.12 | 0.068 |
| 20.50 | -25.49 | -2.05 | 0.00 | -216.37 | 0.00 | 216.37 | 2,975.03 1,487.52 | 4,137.08 2,043.15 | 0.26 | -0.12 | 0.067 |
| 21.00 | -25.37 | -2.04 | 0.00 | -215.35 | 0.00 | 215.35 | 2,970.37 1,485.19 | 4,120.91 2,035.16 | 0.27 | -0.12 | 0.067 |
| 21.50 | -25.25 | -2.04 | 0.00 | -214.32 | 0.00 | 214.32 | 2,965.70 1,482.85 | 4,104.77 2,027.19 | 0.29 | -0.13 | 0.067 |
| 22.00 | -25.13 | -2.03 | 0.00 | -213.30 | 0.00 | 213.30 | 2,961.02 1,480.51 | 4,088.63 2,019.22 | 0.30 | -0.13 | 0.067 |
| 22.50 | -25.01 | -2.03 | 0.00 | -212.29 | 0.00 | 212.29 | 2,956.33 1,478.16 | 4,072.52 2,011.26 | 0.31 | -0.13 | 0.067 |
| 23.00 | -24.90 | -2.03 | 0.00 | -211.27 | 0.00 | 211.27 | 2,951.62 1,475.81 | 4,056.42 2,003.31 | 0.33 | -0.14 | 0.067 |
| 23.50 | -24.78 | -2.02 | 0.00 | -210.26 | 0.00 | 210.26 | 2,946.91 1,473.46 | 4,040.34 1,995.37 | 0.34 | -0.14 | 0.067 |
| 24.00 | -24.66 | -2.02 | 0.00 | -209.25 | 0.00 | 209.25 | 2,942.19 1,471.09 | 4,024.27 1,987.44 | 0.36 | -0.14 | 0.066 |
| 24.50 | -24.55 | -2.01 | 0.00 | -208.24 | 0.00 | 208.24 | 2,937.46 1,468.73 | 4,008.22 1,979.51 | 0.37 | -0.15 | 0.066 |
| 25.00 | -24.43 | -2.01 | 0.00 | -207.24 | 0.00 | 207.24 | 2,932.71 1,466.36 | 3,992.19 1,971.59 | 0.39 | -0.15 | 0.066 |
| 25.50 | -24.31 | -2.00 | 0.00 | -206.23 | 0.00 | 206.23 | 2,927.96 1,463.98 | 3,976.18 1,963.68 | 0.40 | -0.15 | 0.066 |
| 26.00 | -24.20 | -2.00 | 0.00 | -205.23 | 0.00 | 205.23 | 2,923.19 1,461.60 | 3,960.18 1,955.78 | 0.42 | -0.16 | 0.066 |
| 26.50 | -24.08 | -1.99 | 0.00 | -204.24 | 0.00 | 204.24 | 2,918.42 1,459.21 | 3,944.20 1,947.89 | 0.44 | -0.16 | 0.066 |
| 27.00 | -23.96 | -1.99 | 0.00 | -203.24 | 0.00 | 203.24 | 2,913.63 1,456.82 | 3,928.23 1,940.01 | 0.45 | -0.16 | 0.066 |
| 27.50 | -23.85 | -1.98 | 0.00 | -202.25 | 0.00 | 202.25 | 2,910.08 1,455.04 | 3,913.96 1,932.96 | 0.47 | -0.16 | 0.065 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

| 28.00 | -23.73 | -1.98 | 0.00 | -201.26 | 0.00 | 201.26 | 2,903.11 1,451.55 | 3,895.11 1,923.65 | 0.49 | -0.17 | 0.065 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 28.50 | -23.62 | -1.97 | 0.00 | -200.27 | 0.00 | 200.27 | 2,896.13 1,448.07 | 3,876.32 1,914.37 | 0.50 | -0.17 | 0.065 |
| 29.00 | -23.50 | -1.97 | 0.00 | -199.29 | 0.00 | 199.29 | 2,889.16 1,444.58 | 3,857.57 1,905.11 | 0.52 | -0.17 | 0.065 |
| 29.50 | -23.38 | -1.96 | 0.00 | -198.30 | 0.00 | 198.30 | 2,882.19 1,441.09 | 3,838.86 1,895.87 | 0.54 | -0.18 | 0.065 |
| 30.00 | -23.27 | -1.95 | 0.00 | -197.32 | 0.00 | 197.32 | 2,875.21 1,437.61 | 3,820.20 1,886.65 | 0.56 | -0.18 | 0.065 |
| 30.50 | -23.15 | -1.95 | 0.00 | -196.35 | 0.00 | 196.35 | 2,868.24 1,434.12 | 3,801.59 1,877.46 | 0.58 | -0.18 | 0.065 |
| 31.00 | -23.04 | -1.94 | 0.00 | -195.37 | 0.00 | 195.37 | 2,861.26 1,430.63 | 3,783.02 1,868.29 | 0.60 | -0.19 | 0.065 |
| 31.50 | -22.88 | -1.94 | 0.00 | -194.40 | 0.00 | 194.40 | 2,854.29 1,427.15 | 3,764.50 1,859.14 | 0.62 | -0.19 | 0.065 |
| 32.00 | -22.71 | -1.93 | 0.00 | -193.43 | 0.00 | 193.43 | 2,847.32 1,423.66 | 3,746.02 1,850.02 | 0.64 | -0.19 | 0.064 |
| 32.50 | -22.55 | -1.92 | 0.00 | -192.47 | 0.00 | 192.47 | 2,840.34 1,420.17 | 3,727.58 1,840.91 | 0.66 | -0.20 | 0.064 |
| 33.00 | -22.39 | -1.91 | 0.00 | -191.51 | 0.00 | 191.51 | 2,833.37 1,416.69 | 3,709.20 1,831.83 | 0.68 | -0.20 | 0.064 |
| 33.50 | -22.22 | -1.90 | 0.00 | -190.55 | 0.00 | 190.55 | 2,826.40 1,413.20 | 3,690.85 1,822.77 | 0.70 | -0.20 | 0.063 |
| 34.00 | -22.06 | -1.90 | 0.00 | -189.60 | 0.00 | 189.60 | 2,819.42 1,409.71 | 3,672.56 1,813.74 | 0.72 | -0.20 | 0.063 |
| 34.50 | -21.90 | -1.89 | 0.00 | -188.65 | 0.00 | 188.65 | 2,812.45 1,406.22 | 3,654.31 1,804.72 | 0.74 | -0.21 | 0.063 |
| 35.00 | -21.74 | -1.88 | 0.00 | -187.71 | 0.00 | 187.71 | 2,805.48 1,402.74 | 3,636.10 1,795.73 | 0.76 | -0.21 | 0.063 |
| 35.50 | -21.69 | -1.88 | 0.00 | -186.77 | 0.00 | 186.77 | 2,798.50 1,399.25 | 3,617.94 1,786.76 | 0.79 | -0.21 | 0.063 |
| 35.67 | -21.62 | -1.87 | 0.00 | -186.45 | 0.00 | 186.45 | 2,248.07 1,124.03 | 2,973.91 1,468.70 | 0.79 | -0.21 | 0.073 |
| 36.00 | -21.51 | -1.87 | 0.00 | -185.83 | 0.00 | 185.83 | 2,245.83 1,122.91 | 2,966.06 1,464.83 | 0.81 | -0.22 | 0.072 |
| 36.50 | -21.47 | -1.87 | 0.00 | -184.89 | 0.00 | 184.89 | 2,242.46 1,121.23 | 2,954.30 1,459.02 | 0.83 | -0.22 | 0.072 |
| 36.67 | -21.41 | -1.87 | 0.00 | -184.58 | 0.00 | 184.58 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.84 | -0.22 | 0.072 |
| 36.67 | -21.41 | -1.87 | 0.00 | -184.58 | 0.00 | 184.58 | 2,241.31 1,120.65 | 2,950.31 1,457.05 | 0.84 | -0.22 | 0.077 |
| 37.00 | -21.31 | -1.86 | 0.00 | -183.96 | 0.00 | 183.96 | 2,239.08 1,119.54 | 2,942.55 1,453.22 | 0.85 | -0.22 | 0.077 |
| 37.50 | -21.21 | -1.86 | 0.00 | -183.03 | 0.00 | 183.03 | 2,235.69 1,117.84 | 2,930.81 1,447.42 | 0.88 | -0.23 | 0.077 |
| 38.00 | -21.11 | -1.85 | 0.00 | -182.10 | 0.00 | 182.10 | 2,232.29 1,116.14 | 2,919.08 1,441.62 | 0.90 | -0.23 | 0.077 |
| 38.50 | -21.01 | -1.85 | 0.00 | -181.18 | 0.00 | 181.18 | 2,228.88 1,114.44 | 2,907.36 1,435.83 | 0.93 | -0.23 | 0.077 |
| 39.00 | -20.91 | -1.84 | 0.00 | -180.25 | 0.00 | 180.25 | 2,225.46 1,112.73 | 2,895.64 1,430.05 | 0.95 | -0.24 | 0.077 |
| 39.50 | -20.81 | -1.84 | 0.00 | -179.33 | 0.00 | 179.33 | 2,222.03 1,111.01 | 2,883.93 1,424.27 | 0.98 | -0.24 | 0.076 |
| 40.00 | -20.71 | -1.83 | 0.00 | -178.41 | 0.00 | 178.41 | 2,218.59 1,109.29 | 2,872.23 1,418.49 | 1.00 | -0.24 | 0.076 |
| 40.50 | -20.61 | -1.83 | 0.00 | -177.50 | 0.00 | 177.50 | 2,215.14 1,107.57 | 2,860.55 1,412.72 | 1.03 | -0.25 | 0.076 |
| 41.00 | -20.51 | -1.82 | 0.00 | -176.58 | 0.00 | 176.58 | 2,211.67 1,105.84 | 2,848.87 1,406.95 | 1.05 | -0.25 | 0.076 |
| 41.50 | -20.42 | -1.82 | 0.00 | -175.67 | 0.00 | 175.67 | 2,208.20 1,104.10 | 2,837.20 1,401.18 | 1.08 | -0.26 | 0.076 |
| 42.00 | -20.32 | -1.81 | 0.00 | -174.76 | 0.00 | 174.76 | 2,204.72 1,102.36 | 2,825.53 1,395.43 | 1.11 | -0.26 | 0.076 |
| 42.50 | -20.22 | -1.81 | 0.00 | -173.85 | 0.00 | 173.85 | 2,201.23 1,100.61 | 2,813.88 1,389.67 | 1.13 | -0.26 | 0.075 |
| 43.00 | -20.12 | -1.81 | 0.00 | -172.95 | 0.00 | 172.95 | 2,197.72 1,098.86 | 2,802.24 1,383.92 | 1.16 | -0.27 | 0.075 |
| 43.50 | -20.02 | -1.80 | 0.00 | -172.04 | 0.00 | 172.04 | 2,194.21 1,097.10 | 2,790.61 1,378.18 | 1.19 | -0.27 | 0.075 |
| 44.00 | -19.92 | -1.80 | 0.00 | -171.14 | 0.00 | 171.14 | 2,190.68 1,095.34 | 2,778.98 1,372.44 | 1.22 | -0.27 | 0.075 |
| 44.50 | -19.83 | -1.79 | 0.00 | -170.25 | 0.00 | 170.25 | 2,187.15 1,093.57 | 2,767.37 1,366.70 | 1.25 | -0.28 | 0.075 |
| 45.00 | -19.73 | -1.79 | 0.00 | -169.35 | 0.00 | 169.35 | 2,183.60 1,091.80 | 2,755.77 1,360.97 | 1.28 | -0.28 | 0.074 |
| 45.50 | -19.63 | -1.78 | 0.00 | -168.46 | 0.00 | 168.46 | 2,180.05 1,090.02 | 2,744.17 1,355.24 | 1.31 | -0.28 | 0.074 |
| 46.00 | -19.53 | -1.78 | 0.00 | -167.57 | 0.00 | 167.57 | 2,176.48 1,088.24 | 2,732.59 1,349.52 | 1.34 | -0.29 | 0.074 |
| 46.50 | -19.43 | -1.77 | 0.00 | -166.68 | 0.00 | 166.68 | 2,172.91 1,086.45 | 2,721.02 1,343.81 | 1.37 | -0.29 | 0.074 |
| 47.00 | -19.34 | -1.77 | 0.00 | -165.79 | 0.00 | 165.79 | 2,169.32 1,084.66 | 2,709.45 1,338.10 | 1.40 | -0.30 | 0.074 |
| 47.50 | -19.24 | -1.76 | 0.00 | -164.91 | 0.00 | 164.91 | 2,165.72 1,082.86 | 2,697.90 1,332.39 | 1.43 | -0.30 | 0.073 |
| 48.00 | -19.14 | -1.76 | 0.00 | -164.03 | 0.00 | 164.03 | 2,162.11 1,081.06 | 2,686.36 1,326.69 | 1.46 | -0.30 | 0.073 |
| 48.50 | -19.05 | -1.75 | 0.00 | -163.15 | 0.00 | 163.15 | 2,158.50 1,079.25 | 2,674.83 1,321.00 | 1.49 | -0.31 | 0.073 |
| 49.00 | -18.95 | -1.75 | 0.00 | -162.27 | 0.00 | 162.27 | 2,154.87 1,077.43 | 2,663.31 1,315.31 | 1.52 | -0.31 | 0.073 |
| 49.50 | -18.85 | -1.74 | 0.00 | -161.39 | 0.00 | 161.39 | 2,151.23 1,075.61 | 2,651.80 1,309.62 | 1.56 | -0.31 | 0.073 |
| 50.00 | -18.75 | -1.74 | 0.00 | -160.52 | 0.00 | 160.52 | 2,147.58 1,073.79 | 2,640.30 1,303.95 | 1.59 | -0.32 | 0.073 |
| 50.50 | -18.66 | -1.74 | 0.00 | -159.65 | 0.00 | 159.65 | 2,143.92 1,071.96 | 2,628.81 1,298.27 | 1.62 | -0.32 | 0.072 |
| 51.00 | -18.56 | -1.73 | 0.00 | -158.79 | 0.00 | 158.79 | 2,140.25 1,070.13 | 2,617.34 1,292.60 | 1.66 | -0.32 | 0.072 |
| 51.50 | -18.47 | -1.73 | 0.00 | -157.92 | 0.00 | 157.92 | 2,136.57 1,068.29 | 2,605.87 1,286.94 | 1.69 | -0.33 | 0.072 |
| 52.00 | -18.37 | -1.72 | 0.00 | -157.06 | 0.00 | 157.06 | 2,132.88 1,066.44 | 2,594.42 1,281.29 | 1.73 | -0.33 | 0.072 |
| 52.50 | -18.27 | -1.72 | 0.00 | -156.20 | 0.00 | 156.20 | 2,129.18 1,064.59 | 2,582.98 1,275.64 | 1.76 | -0.34 | 0.072 |
| 53.00 | -18.18 | -1.71 | 0.00 | -155.34 | 0.00 | 155.34 | 2,125.47 1,062.73 | 2,571.55 1,269.99 | 1.80 | -0.34 | 0.071 |
| 53.50 | -18.08 | -1.71 | 0.00 | -154.48 | 0.00 | 154.48 | 2,121.75 1,060.87 | 2,560.13 1,264.35 | 1.83 | -0.34 | 0.071 |
| 54.00 | -17.99 | -1.70 | 0.00 | -153.63 | 0.00 | 153.63 | 2,118.01 1,059.01 | 2,548.72 1,258.72 | 1.87 | -0.35 | 0.071 |
| 54.50 | -17.89 | -1.70 | 0.00 | -152.78 | 0.00 | 152.78 | 2,114.27 1,057.14 | 2,537.32 1,253.09 | 1.91 | -0.35 | 0.071 |
| 55.00 | -17.79 | -1.69 | 0.00 | -151.93 | 0.00 | 151.93 | 2,110.52 1,055.26 | 2,525.94 1,247.47 | 1.94 | -0.35 | 0.071 |
| 55.50 | -17.70 | -1.69 | 0.00 | -151.08 | 0.00 | 151.08 | 2,106.75 1,053.38 | 2,514.57 1,241.85 | 1.98 | -0.36 | 0.071 |
| 56.00 | -17.60 | -1.68 | 0.00 | -150.24 | 0.00 | 150.24 | 2,102.98 1,051.49 | 2,503.21 1,236.24 | 2.02 | -0.36 | 0.070 |
| 56.50 | -17.51 | -1.68 | 0.00 | -149.40 | 0.00 | 149.40 | 2,099.20 1,049.60 | 2,491.86 1,230.64 | 2.05 | -0.36 | 0.070 |
| 57.00 | -17.41 | -1.68 | 0.00 | -148.56 | 0.00 | 148.56 | 2,095.40 1,047.70 | 2,480.53 1,225.04 | 2.09 | -0.37 | 0.070 |
| 57.50 | -17.32 | -1.67 | 0.00 | -147.72 | 0.00 | 147.72 | 2,091.60 1,045.80 | 2,469.21 1,219.45 | 2.13 | -0.37 | 0.070 |
| 58.00 | -17.22 | -1.67 | 0.00 | -146.88 | 0.00 | 146.88 | 2,087.78 1,043.89 | 2,457.90 1,213.86 | 2.17 | -0.38 | 0.070 |

Customer: SPRINT NEXTEL



| 89.50 | -11.65 | -1.62 | 0.00 | -96.55 | 0.00 | 96.55 | 1,387.20 | 693.60 | 1,384.25 | 683.63 |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 90.00 | -11.58 | -1.63 | 0.00 | -95.74 | 0.00 | 95.74 | 1,384.32 | 692.16 | 1,376.86 | 683.63 679.98 | 5.47 5.54 | -0.64 -0.64 | 0.072 0.072 |
| 90.50 | -11.50 | -1.63 | 0.00 | -94.92 | 0.00 | 94.92 |  | 690.71 | 1,369.48 |  | 5.54 | -0.64 | 0.072 |
| 91.00 | -11.43 | -1.64 | 0.00 | -94.11 | 0.00 | 94.11 | $1,381.42$ $1,378.52$ | 689.26 | $1,369.48$ $1,362.10$ | 676.33 672.69 | 5.61 5.68 | -0.65 -0.65 | 0.072 0.071 |
| 91.50 | -11.35 | -1.64 | 0.00 | -93.29 | 0.00 | 93.29 | 1,375.61 | 689.26 687.80 | 1,362.10 | 672.69 669.06 | 5.68 5.74 | -0.65 -0.65 | 0.071 0.071 |
| 92.00 | -11.27 | -1.64 | 0.00 | -92.47 | 0.00 | 92.47 | 1,372.68 | 686.34 | 1,347.39 | 665.42 | 5.81 | -0.66 | 0.070 |
| 92.50 | -11.20 | -1.65 | 0.00 | -91.65 | 0.00 | 91.65 | 1,369.75 | 684.87 | 1,340.04 | 661.80 | 5.88 | -0.66 | 0.070 |
| 93.00 | -11.12 | -1.65 | 0.00 | -90.82 | 0.00 | 90.82 | 1,366.80 | 683.40 | 1,332.70 | 658.17 | 5.95 | -0.67 | 0.070 |
| 93.50 | -11.05 | -1.66 | 0.00 | -90.00 | 0.00 | 90.00 | 1,363.85 | 681.92 | 1,325.38 | 654.55 | 6.02 | -0.67 | 0.069 |
| 94.00 94.50 | -10.97 | -1.66 | 0.00 0.00 | -89.17 | 0.00 0.00 | 89.17 88.34 | $1,360.88$ 135790 | 680.44 | 1,318.06 | 650.94 | 6.09 | -0.68 | 0.069 |
| 95.00 | -10.82 | -1.67 | 0.00 | -87.51 | 0.00 | 87.51 | $1,357.90$ $1,354.92$ | 678.95 | $1,310.75$ 130345 | 647.33 | 6.17 | -0.68 | 0.068 |
| 95.50 | -10.75 | -1.67 | 0.00 | -86.67 | 0.00 | 86.67 | 1,351.92 | 677.46 | 1,303.45 | 643.72 640.12 | 6.24 6.31 | -0.69 -0.69 | 0.068 |
| 96.00 | -10.67 | -1.68 | 0.00 | -85.84 | 0.00 | 85.84 | 1,348.91 | 674.46 | 1,288.88 | 636.53 | 6.38 | -0.70 | 0.067 |
| 96.50 | -10.60 | -1.68 | 0.00 | -85.00 | 0.00 | 85.00 | 1,345.89 | 672.95 | 1,281.61 | 632.94 | 6.45 | -0.70 | 0.067 |
| 97.00 | -10.52 | -1.68 | 0.00 | -84.16 | 0.00 | 84.16 | 1,342.86 | 671.43 | 1,274.35 | 629.35 | 6.53 | -0.70 | 0.066 |
| 97.50 98.00 | -10.45 | -1.69 | 0.00 | -83.32 | 0.00 | 83.32 | 1,339.82 | 669.91 | 1,267.09 | 625.77 | 6.60 | -0.71 | 0.066 |
| 98.00 98.50 | -10.38 | -1.69 | 0.00 | -82.47 | 0.00 | 82.47 | 1,336.78 | 668.39 | 1,259.85 | 622.19 | 6.68 | -0.71 | 0.066 |
| 99.00 | -10.33 | -1.70 | 0.00 0.00 | -81.63 | 0.00 | 81.63 80 | 1,333.72 | 666.86 | 1,252.62 | 618.62 | 6.75 | -0.72 | 0.065 |
| 99.50 | -10.15 | -1.70 | 0.00 | -79.93 | 0.00 0.00 | 80.78 79.93 | 1,330.65 | 665.32 | 1,245.40 | 615.06 | 6.83 | -0.72 | 0.065 |
| 100.00 | -10.08 | -1.71 | 0.00 | -79.07 | 0.00 | 79.07 | 1,327.57 | 663.78 | 1,238.19 | 611.50 | 6.90 | -0.73 | 0.064 |
| 100.50 | -10.01 | -1.71 | 0.00 | -78.22 | 0.00 | 78.22 | 1,321.37 | 660.69 | 1,223.80 | 604.39 | 7.06 | -0.73 | 0.064 |
| 101.00 | -9.93 | -1.72 | 0.00 | -77.36 | 0.00 | 77.36 | 1,318.26 | 659.13 | 1,216.62 | 600.84 | 7.13 | -0.73 -0.74 | 0.063 0.063 |
| 101.50 | -9.86 | -1.72 | 0.00 | -76.51 | 0.00 | 76.51 | 1,315.14 | 657.57 | 1,209.45 | 597.30 | 7.21 | -0.74 | 0.062 |
| 102.00 | -9.78 | -1.72 | 0.00 | -75.65 | 0.00 | 75.65 | 1,312.01 | 656.00 | 1,202.30 | 593.77 | 7.29 | -0.75 | 0.062 |
| 102.50 103.00 | -9.71 -9.64 | -1.73 | 0.00 | -74.78 | 0.00 | 74.78 | 1,308.86 | 654.43 | 1,195.15 | 590.24 | 7.37 | -0.75 | 0.061 |
| 103.50 | -9.64 -9.56 | -1.73 | 0.00 0.00 | -73.92 | 0.00 | 73.92 | 1,305.71 | 652.86 | 1,188.02 | 586.72 | 7.45 | -0.76 | 0.061 |
| 104.00 | -9.49 | -1.74 | 0.00 | -73.05 -72.19 | 0.00 0.00 | 73.05 72.19 | 1,302.55 | 651.27 | 1,180.89 | 583.20 | 7.53 | -0.76 | 0.061 |
| 104.50 | -9.42 | -1.74 | 0.00 | -71.32 | 0.00 | 71.32 | 1,296.19 | 648.09 | 1,166.78 | 579.69 | 7.61 | -0.76 | 0.060 |
| 105.00 | -9.34 | -1.74 | 0.00 | -70.45 | 0.00 | 70.45 | 1,292.99 | 646.50 | 1,159.59 | 576.18 572.68 | 7.69 7.77 | -0.77 | 0.060 0.059 |
| 105.50 | -9.27 | -1.75 | 0.00 | -69.58 | 0.00 | 69.58 | 1,288.98 | 644.49 | 1,151.78 | 568.82 | 7.85 | -0.78 | 0.059 |
| 106.00 | -9.20 | -1.75 | 0.00 | -68.70 | 0.00 | 68.70 | 1,284.33 | 642.16 | 1,143.44 | 564.70 | 7.93 | -0.78 | 0.058 |
| 106.50 | -9.13 | -1.75 | 0.00 | -67.83 | 0.00 | 67.83 | 1,279.68 | 639.84 | 1,135.13 | 560.60 | 8.01 | -0.79 | 0.058 |
| 107.00 | -9.05 | -1.76 | 0.00 | -66.95 | 0.00 | 66.95 | 1,275.03 | 637.51 | 1,126.85 | 556.51 | 8.09 | -0.79 | 0.057 |
| 107.50 108.00 | -8.98 -8.91 | -1.76 -176 | 0.00 0.00 | -66.07 -65.19 | 0.00 | 66.07 | 1,270.38 | 635.19 | 1,118.60 | 552.44 | 8.18 | -0.79 | 0.057 |
| 108.50 | -8.83 | -1.76 | 0.00 0.00 | -65.19 -64.31 | 0.00 0.00 | 65.19 | 1,265.73 | 632.87 | 1,110.38 | 548.38 | 8.26 | -0.80 | 0.056 |
| 109.00 | -8.76 | -1.77 | 0.00 | -63.43 | 0.00 | 63.43 | ,256.43 |  | 1,102.19 | 544.33 | 8.34 | -0.80 | 0.056 |
| 109.50 | -8.69 | -1.77 | 0.00 | -62.55 | 0.00 | 62.55 | 1,251.78 | 628.22 | 1,094.04 | 540.30 | 8.43 | -0.81 | 0.055 |
| 110.00 | -8.63 | -1.77 | 0.00 | -61.66 | 0.00 | 61.66 | 1,251.78 | 625.89 | 1,085. | 536.29 | 8.51 | -0.81 | 0.055 |
| 110.00 | -8.63 | -1.77 | 0.00 | -61.66 | 0.00 | 61.66 | 1,247.14 | 623.57 | 1,077.81 | 532.29 | 8.60 | -0.81 | 0.054 |
| 110.50 | -8.57 | -1.77 | 0.00 | -60.78 | 0.00 | 60.78 | 851.46 | 425.73 | 741.79 73746 | 366.34 | 8.60 | -0.81 | 0.000 |
| 111.00 | -8.51 | -1.77 | 0.00 | -59.89 | 0.00 | 59.89 | 849.67 | 425.73 424 | 737.46 | 364.21 362.07 | 8.68 8.77 | -0.82 -0.82 | 0.076 0.075 |
| 111.50 | -8.45 | -1.78 | 0.00 | -59.00 | 0.00 | 59.00 | 847.87 | 423.94 | 728.83 | 359.94 | 8.86 | -0.83 | 0.075 0.074 |
| 112.00 | -8.39 | -1.78 | 0.00 | -58.12 | 0.00 | 58.12 | 846.07 | 423.03 | 724.52 | 357.81 | 8.94 | -0.83 | 0.073 |
| 112.50 | -8.33 | -1.78 | 0.00 | -57.23 | 0.00 | 57.23 | 844.25 | 422.12 | 720.21 | 355.68 | 9.03 | -0.84 | 0.073 |
| 113.00 | -8.27 | -1.78 | 0.00 | -56.34 | 0.00 | 56.34 | 842.42 | 421.21 | 715.90 | 353.56 | 9.12 |  |  |
| 113.50 | -8.21 | -1.78 | 0.00 | -55.45 | 0.00 | 55.45 | 840.58 | 420.29 | 711.60 | 351.43 | 9.21 | -0.85 | 0.072 0.071 |
| 114.00 | -8.15 | -1.78 | 0.00 | -54.56 | 0.00 | 54.56 | 838.73 | 419.36 | 707.30 | 349.31 | 9.30 | -0.85 | 0.070 |
| 114.50 | -8.09 | -1.78 | 0.00 | -53.67 | 0.00 | 53.67 | 836.87 | 418.43 | 703.00 | 347.19 | 9.39 | -0.86 | 0.069 |
| 115.00 | -8.03 | -1.78 | 0.00 | -52.78 | 0.00 | 52.78 | 834.99 | 417.50 | 698.71 | 345.06 | 9.48 | -0.86 | 0.068 |
| 115.50 | -7.97 | -1.78 | 0.00 | -51.89 | 0.00 | 51.89 | 833.11 | 416.56 | 694.42 | 342.95 | 9.57 | -0.87 | 0.067 |
| 116.00 | -7.91 -7.87 | -1.78 | 0.00 | -51.00 | 0.00 | 51.00 | 831.22 | 415.61 | 690.13 | 340.83 | 9.66 | -0.87 | 0.067 |
| 116.50 | -7.87 -7.87 | -1.78 | 0.00 | -50.11 | 0.00 | 50.11 | 829.32 | 414.66 | 685.85 | 338.71 | 9.75 | -0.88 | 0.066 |
| 117.00 | -7.83 | -1.78 | 0.00 | -49.22 | 0.00 | 50.11 | 829.32 | 414.66 | 685.85 | 338.71 | 9.75 | -0.88 | 0.157 |
| 117.50 | -7.80 | -1.78 | 0.00 | -48.33 | 0.00 | 49.22 | 827.41 | 413.70 | 681.57 | 336.60 | 9.84 | -0.88 | 0.156 |
| 118.00 | -7.76 | -1.78 | 0.00 | -47.43 | 0.00 | 48.33 | 825.48 | 412.74 | 677.29 | 334.49 | 9.94 | -0.89 | 0.154 |
| 118.50 | -7.72 | -1.78 | 0.00 | -46.54 | 0.00 | 47.43 | 823.55 | 411.77 | 673.02 | 332.38 | 10.03 | -0.91 | 0.152 |
| 119.00 | -7.68 | -1.79 | 0.00 | -45.65 | 0.00 | 45.65 | 821.61 | 410.80 | 668.75 | 330.27 | 10.13 | -0.92 | 0.150 |
| 119.50 | -7.65 | -1.79 | 0.00 | -44.76 | 0.00 | 44.76 | 817.69 | 409.83 | 664.49 | 328.17 | 10.22 | -0.93 | 0.148 |
| 120.00 | -7.61 | -1.79 | 0.00 | -43.86 | 0.00 | 43.86 | 817.61 | 408.84 | 660.23 | 326.06 | 10.32 | -0.94 | 0.147 |
|  |  |  |  |  |  |  |  | 407.86 | 655.98 | 323.96 | 10.42 | -0.95 | 0.145 |

Site Number: 302494
Site Name: Hddm - Haddam, CT
Customer: SPRINT NEXTEL

| Site Number: | 302494 | Code: ANSI/TIA-222-G | ल2007-2018 by ATC IP LLC. All rights reserved. |
| :--- | :--- | :--- | :--- | :--- |
| Site Name: | Hddm - Haddam, CT | Engineering Number: OAA712589_C3_05 | $4 / 24 / 2018$ 5:54:39 PM |
| Customer: | SPRINT NEXTEL |  |  |

Analysis Summary

| Load Case | Reactions |  |  |  |  |  | Max Usage |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Shear FX (kips) | Shear FZ (kips) | Axial FY (kips) | Moment MX <br> (ft-kips) | Moment MY <br> (ft-kips) | Moment MZ (ft-kips) | Elev <br> (ft) | Interaction Ratio |
| $1.2 \mathrm{D}+1.6 \mathrm{~W}$ | 22.07 | 0.00 | 42.08 | 0.00 | 0.00 | 2345.13 | 116.50 | 0.86 |
| $0.9 \mathrm{D}+1.6 \mathrm{~W}$ | 21.10 | 0.00 | 31.56 | 0.00 | 0.00 | 2203.30 | 116.50 | 0.82 |
| $1.2 \mathrm{D}+1.0 \mathrm{Di}+1.0 \mathrm{Wi}$ | 4.49 | 0.00 | 67.13 | 0.00 | 0.00 | 525.86 | 116.50 | 0.24 |
| (1.2 + 0.2Sds) * DL + E ELFM | 1.37 | 0.00 | 43.26 | 0.00 | 0.00 | 176.90 | 116.50 | 0.08 |
| $(1.2+0.2 \mathrm{Sds})^{*} \mathrm{DL}+\mathrm{E}$ EMAM | 2.17 | 0.00 | 43.26 | 0.00 | 0.00 | 267.23 | 116.50 | 0.17 |
| (0.9-0.2Sds) * DL + E ELFM | 1.36 | 0.00 | 30.15 | 0.00 | 0.00 | 172.37 | 116.50 | 0.08 |
| (0.9-0.2Sds) * DL + E EMAM | 2.17 | 0.00 | 30.15 | 0.00 | 0.00 | 260.04 | 116.50 | 0.16 |
| 1.0D + 1.0W | 4.65 | 0.00 | 35.07 | 0.00 | 0.00 | 489.81 | 116.50 | 0.19 |

## Additional Steel Summary

|  |  | Intermediate Connectors |  |  | Upper Termination |  |  |  | Lower Termination |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Elev | Elev | Shear |  | Shear | Connectors |  |  |  | Connectors |  |  |  | Max Member |  |  |
| From <br> (ft) | To <br> (ft) Member | $\begin{gathered} \mathrm{VQ} / I \\ (\mathrm{lb} / \mathrm{in}) \end{gathered}$ | Applied (kips) | phiVn <br> (kips) | MQ/I <br> (kips) | $\begin{aligned} & \text { phiVn } \\ & \text { (kips) } \end{aligned}$ | Num Reqd |  | $\begin{gathered} \text { MQ/l } \\ \text { (kips) } \end{gathered}$ | $\begin{aligned} & \text { phiVn } \\ & \text { (kips) } \end{aligned}$ | Num Reqd | Num <br> Actual | $\begin{gathered} \mathrm{Pu} \\ \text { (kip) } \end{gathered}$ | $\begin{aligned} & \text { phiPn } \\ & \text { (kip) } \end{aligned}$ | Ratio |
| 0.00 | 36.6 (3) PL-PL $7 \times 1.25$ | 364.3 | 6.6 | 25.3 | 0.0 | 25.3 | 0 | 0 | 0.0 | 25.3 | 0 | 0 | 377.9 | 482.5 | 0.783 |
| 36.6 | 73.3 (3) PL-PL $6 \times 1.25$ | 382.1 | 6.9 | 25.3 | 0.0 | 25.3 | 0 | 0 | 0.0 | 25.3 | 0 | 0 | 326.2 | 413.6 | 0.789 |
| 73.3 | 110. (3) PL-PL 5" $\times 1.25{ }^{\prime \prime}$ | 416.7 | 7.5 | 25.3 | 0.0 | 25.3 | 0 | 0 | 0.0 | 25.3 | 0 | 0 | 250.6 | 344.6 | 0.727 |
| 110. | 116. (3) PL-PL $4 \times 1.25$ | 435.0 | 7.8 | 25.3 | 123.3 | 25.3 | 5 | 6 | 0.0 | 25.3 | 0 | 0 | 147.8 | 275.7 | 0.536 |



Code Rev. $\boldsymbol{G}$

| Date | $4 / 24 / 2018$ |
| ---: | :---: |
| Engineer | Aaron.Rucker |
| Site \# | 302494 |
| Carrier | SPRINT NEXTEL |
|  |  |

$\leftrightarrow$

$\downarrow$

Plate Stress Ratio:
0.29 (Pass)

Bolt Stress Ratio:
0.73 (Pass)

Extra Bolt Stress Ratio:
0.90 (Pass)


Site Name:
Site Number:
Engineering Number:
Engineer:
Date:
Tower Type:

## Design Loads (Factored) - Analysis per TIA-222-G Standards

Design / Analysis / Mapping:
Compression/Leg:
Uplift/Leg:
Total Shear:
Moment:
Tower + Appurtenance Weight:
Depth to Base of Foundation ( $1+t-h$ ):
Diameter of Pier (d):
Height of Pier above Ground (h):
Width of Pad (W):
Length of Pad (L):
Thickness of Pad ( t ):
Tower Leg Center to Center:
Number of Tower Legs:
Tower Center from Mat Center:
Depth Below Ground Surface to Water Table:
Unit Weight of Concrete:
Unit Weight of Soil Above Water Table:
Unit Weight of Water:
Unit Weight of Soil Below Water Table:
Friction Angle of Uplift:
Ultimate Coefficient of Shear Friction:
Ultimate Compressive Bearing Pressure:
Ultimate Passive Pressure on Pad Face:
$\phi_{\text {Soil and Concrete Weight: }}$
$\phi_{\text {Soil }}$ :

## Overturning Moment Usage

## Design OTM:

OTM Resistance:
Design OTM / OTM Resistance:

## Soil Bearing Pressure Usage

Net Bearing Pressure:
Factored Nominal Bearing Pressure:
Net Bearing Pressure/Factored Nominal Bearing Pressure:
Load Direction Controling Design Bearing Pressure:

## Sliding Factor of Safety

Total Factored Sliding Resistance:
201.5 k

Sliding Design / Sliding Resistance:

Mapping
42.1 k
0.0 k
22.1 k
2345.1 k-ft
39.3 k
4.40 ft
5.64 ft
1.80
20.00 ft
19.40 ft
2.20 ft
0.00 ft
1.0 (1 if MP or GT)
0.00 ft
8.00 ft
150.0 pcf
125.0 pcf
62.4 pcf
65.0 pcf
43.0 Degrees
0.40
10600.0 psf
4000.0 psf
0.9
0.75

$$
2482.0 \mathrm{k}-\mathrm{ft}
$$

2678.4 k -ft 0.93 Result: OK

3996 psf
7950 psf 0.50 Result: OK Diagonal to Pad Edge

Program Last Updated: 5/13/2014



[^0]:    Nathaniel R Ober E.I.T.
    Northeast Structural Region Lead | Infinigy
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    (O) (518) 690-0790 |(M) (303) 704-0322
    nober@infinigy.com | www.infinigy.com

[^1]:    *Deflection and Sway was evaluated considering a design wind speed of 60 mph (3-Second Gust) per ANSI/TIA-222-G

