

STATE OF CONNECTICUT  
CONNECTICUT SITING COUNCIL

IN RE: :  
 :  
A PETITION OF SBA COMMUNICATIONS : PETITION NO. 1461  
CORPORATION FOR A DECLARATORY :  
RULING ON THE NEED TO OBTAIN A :  
SITING COUNCIL CERTIFICATE FOR THE :  
REPLACEMENT AND RELOCATION OF A :  
TELECOMMUNICATIONS TOWER AT 130 :  
WELLES ROAD, GROTON, CONNECTICUT : OCTOBER 26, 2021

**RESPONSES OF SBA COMMUNICATIONS CORPORATION  
TO CONNECTICUT SITING COUNCIL INTERROGATORIES, SET ONE**

On October 12, 2021, the Connecticut Siting Council (“Council”) issued Interrogatories, Set One to SBA Communications Corporation (“SBA”), relating to Petition No. 1461. Below are SBA’s responses.

Question No. 1

Would the replacement tower have a galvanized gray finish?

Response

Yes.

Question No. 2

Referencing Sheet C-2, identify each carrier’s equipment pad and ground equipment and/or equipment shelters. Referencing page 3 of the Petition, SBA Communications Corporation (SBA or Petitioner) notes that “Dish (Network) will also be installing three (3) antennas at a centerline height of 160 feet on the new tower.” Identify Dish Network’s equipment pad and ground equipment on Sheet C-2 as applicable.

Response

A revised set of Project Plans is provided in Attachment 1. Revisions to Plan Sheet C-2 show the location of the Dish equipment pad.

Question No. 3

Identify the antennas, antenna mounts, and other tower mounted equipment for Dish Network to be installed at the 160-foot level of the tower, if known.

Response

Revised Project Plans (Attachment 1) includes details on the antennas that Dish intends to install on the tower. Dish antennas will be attached to a low-profile antenna platform at a centerline height of 160 feet above grade.

Question No. 4

Referencing Sheet C-3, provide a tower elevation drawing identifying the new and relocated antennas, mounts, and tower mounted equipment for AT&T, Sprint, T-Mobile, and Dish Network.

Response

The existing Tower elevation drawing on Plan Sheet C-3 identifies the proposed location of the AT&T (176'), Dish (160'), Sprint (117.5') and T-Mobile (108') antennas on the proposed replacement monopole.

Question No. 5

Could the replacement tower be designed with a yield point to ensure that the tower setback radius remains within the boundaries of the subject property? What is the incremental cost of installing a yield point on the tower?

Response

The proposed 180-foot tower certainly could be designed with a yield point as described but under the current land ownership scenario in Groton, the Petitioner does not believe that such a design change is warranted. While the proposed tower is within 180 feet of the parcel boundary to the north, the adjacent parcel to the north is also owned by the Town of Groton and, together with the subject parcel, is a part of the Town's Shady Oaks Park parcel. That said, if SBA were to design the tower with a yield point as described, it would estimate the tower cost would increase by approximately 10 to 12%).

Question No. 6

Estimate the total cost of the project assuming no yield point and excluding AT&T's total equipment and equipment installation cost.

Response

The total cost of the Project excluding AT&T's equipment is estimated to be approximately \$331,050.

Question No. 7

Would the proposed project comply with DEEP noise control standards?

Response

Yes. SBA expects that the noise associated with the modified facility during normal operations will comply with the DEEP's Noise Standards.

Question No. 8

Is the proposed replacement facility located within 1/4-mile of the buffered area on the Connecticut Department of Energy and Environmental Protection Natural Diversity Database (DEEP NDDDB) map, e.g. shaded area associated with Red Brook? If yes, would the proposed

project be expected to impact any state-listed species? If so, what protective/mitigation measures could be employed?

Response

Yes. The existing facility and the proposed replacement tower are approximately 590 feet from the Red Brook buffer, shown on the June 2021 Natural Diversity Data Base Areas map <https://www.depdata.ct.gov/naturalresources/endangeredspeciesmaps/nd059.pdf>.

As described in the Petition, all work associated with the new tower construction will occur within the existing fenced compound. SBA does not anticipate that any of its construction activity will impact any State-listed species therefore no additional protective measures are needed or proposed.

Question No. 9

Provide the distance and direction to the nearest wetland for the existing tower and the proposed replacement tower. Would erosion and sediment controls be used consistent with the *2002 Connecticut Guidelines for Soil and Erosion Control*, as applicable?

Response

The nearest wetland area is located approximately 365 feet to the east of the existing tower location and 385 feet to the east of the proposed tower location. SBA will incorporate appropriate soil erosion and sedimentation control measures, consistent with the 2002 Connecticut Guidelines prior to the start of any construction activity at the subject site. With these measures in place, SBA does not anticipate construction activity would have any adverse impacts on this wetland area.

Question No. 10

Referencing Attachment 3 of the Petition, Replacement Tower Balloon Test Results, it

states, “Additionally, TEP completed a visual effect assessment for the proposed tower on 2/25/2021 for submittal to the Connecticut State Historic Preservation Office (SHPO)...” Has the Petitioner received a response from SHPO? If yes, please include such response.

Response

No. To date the SHPO has not responded to the TEP filing. That said, pursuant to the Nationwide Programmatic Agreement established between the Federal Communications Commission (“FCC”) and the National Historic Preservation Trust, if a SHPO does not respond with a determination of “no adverse effect” in 30 days, an applicant can move forward with a filing with the FCC for review. This is what SBA did in this case with TEP’s determination of “no adverse effects”. See Attachment 2.

Question No. 11

Is any new or additional backup power proposed for any of the carriers, e.g. battery backup or generators?

Response

As referenced in its response to Council Interrogatory No. 5, AT&T plans to continue to utilize its existing Polar 15 kW Model 8220-100-D-15-03 generator at the site. No other existing or proposed wireless carrier will install a generator. SBA expects T-Mobile, Sprint and Dish to utilize battery backup power for its equipment.

Question No. 12

Referencing Attachment 5, Federal Aviation Administration (FAA) Determination of No Hazard to Air Navigation, is the FAA determination based on the correct coordinates of the proposed replacement tower? Explain.

Response

The FAA determination included in the Petition uses coordinates that are slightly different than those listed on the Project Plans. The corrected coordinates will be included in a new FAA filing. Given the minor differences between the coordinates used in the original FAA determination and those shown on the project plans, representing a lateral shift in the tower location of approximately 25 feet, SBA expects to receive another Determination of No Hazard to Air Navigation from the FAA. A copy of the corrected FAA Determination will be forwarded to the Council as soon as it is available.

Question No. 13

Provide the estimated dates for commencement and completion of construction. Also provide the proposed work hours and days of the week.

Response

SBA intends to commence construction shortly after it received Council approval of this Petition. SBA estimates that construction will be completed within approximately 8 to 10 weeks. Work at the site will occur between the hours of 8 a.m. and 5 p.m. Monday through Saturday. SBA will work with its tenants to maintain wireless service throughout construction of the new tower.

**CERTIFICATION OF SERVICE**

I hereby certify that on this 26<sup>th</sup> day of October 2021, a copy of the foregoing was sent,  
via electronic mail, to the following:

Thomas J. Regan, Esq.  
Brown Rudnick LLP  
185 Asylum Street  
Hartford, CT 06103  
TRegan@brownrudnick.com

A handwritten signature in black ink, appearing to read "Kenneth C. Baldwin", written over a horizontal line.

Kenneth C. Baldwin

**PROJECT SUMMARY**

**SITE NAME:** SOUTH LEDYARD  
**SITE I.D.:** CT46142A  
**SITE ADDRESS:** 130 WELLES ROAD  
 GROTON, CT 06340  
**JURISDICTION:** TOWN OF GROTON  
**LAND USE:** MUNICIPALITY  
**PROPERTY OWNER:** TOWN OF GROTON  
**APPLICANT:** SBA COMMUNICATIONS CORPORATION  
 8051 CONGRESS AVENUE  
 BOCA RATON, FL 33487-1307  
 OFFICE: (561) 226-9457  
**PIN:** 271014348692 L:E  
**ZONING CLASS:** RU-80  
**1A CERTIFICATION:**  
**LATITUDE:** N 41° 23' 34.193" (NAD '83)  
**LONGITUDE:** W 71° 58' 12.031" (NAD '83)  
**GROUND ELEVATION:** 52.8± (NAVD '88)  
**OCCUPANCY TYPE:** TELECOMMUNICATIONS FACILITY  
**CONSTRUCTION TYPE:** PROPOSED MONOPOLE TOWER  
**DRIVING DIRECTIONS:** FROM HARTFORD, CT: TAKE PREFERRED ROUTE TO I-84 E. TAKE EXIT 2 FOR CT-2 E TOWARDS NORWICH. TAKE EXIT 28S FOR I-395 S/CT-2A TOWARDS NEW HAVEN. TAKE EXIT 9 FOR CT-2. TURN RIGHT ONTO CT-12 S. TURN LEFT ONTO CT-214 E. TURN RIGHT ONTO CT-184 E. TURN LEFT ONTO WELLES RD. TURN LEFT. SITE WILL BE ON THE RIGHT.

**HANDICAPPED REQUIREMENTS**  
 FACILITY IS UNMANNED AND NOT FOR HUMAN HABITATION. HANDICAP ACCESS NOT REQUIRED.  
**PLUMBING REQUIREMENTS**  
 FACILITY HAS NO PLUMBING.

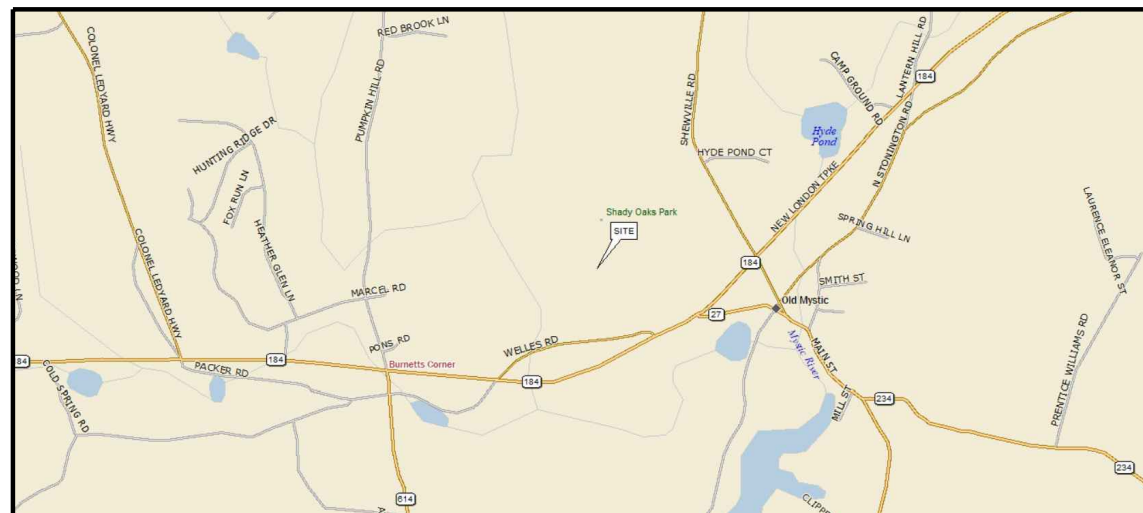
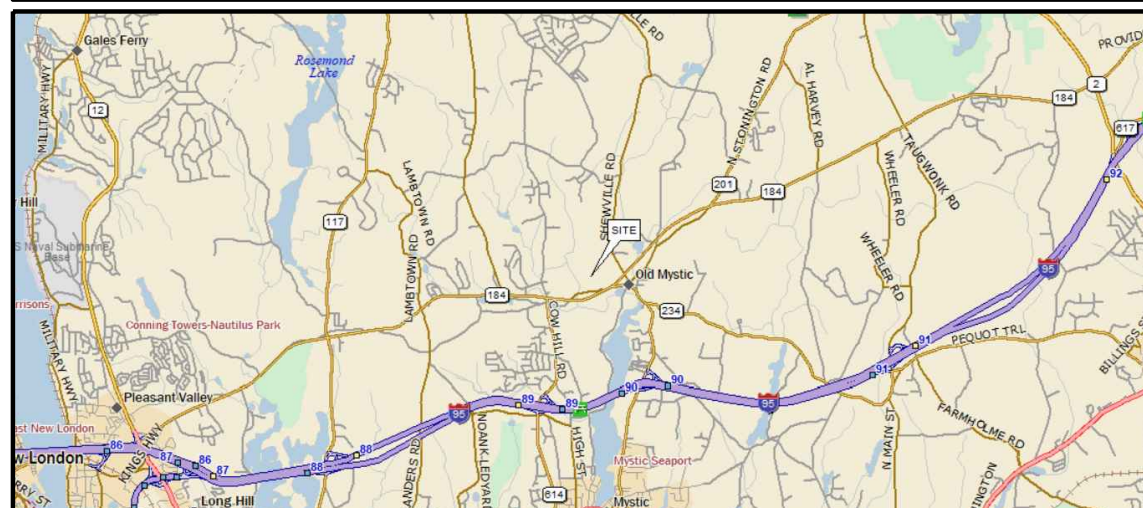
**CONSULTING TEAM**

**ARCHITECTURAL - ENGINEERING FIRM:**  
 TOWER ENGINEERING PROFESSIONALS, INC.  
 326 TRYON ROAD, RALEIGH, NC 27603  
 CONTACT: GRAHAM M. ANDRES, P.E.  
 PHONE: (919) 661-6351 FAX: (919) 661-6350  
**SURVEYING FIRM:**  
 MILLMAN SURVEYING, INC., CORPORATE HEADQUARTERS  
 4111 BRADLEY CIRCLE NW, CANTON, OH 44718  
 CONTACT: GENERAL OFFICE  
 PHONE: (800) 520-1010  
**APPLICANT/LESSEE CONTACTS:**  
 SBA COMMUNICATIONS CORPORATION  
 GREG HINES - (561) 226-9532  
**POWER COMPANY:** TELCO COMPANY:  
 EVERSOURCE AT&T  
 CUSTOMER SERVICE CUSTOMER SERVICE  
 1 (888) 544-4826 PHONE: 1 (800) 288-2020  
**CIVIL/ELECTRICAL ENGINEER:**  
 TOWER ENGINEERING PROFESSIONALS, INC.  
 326 TRYON ROAD, RALEIGH, NC 27603  
 CONTACT: GRAHAM M. ANDRES, P.E.  
 PHONE: (919) 661-6351 FAX: (919) 661-6350



**SITE NAME**  
**SOUTH LEDYARD**  
**SBA SITE I.D.**  
**CT46142A**  
**ADDRESS**  
**130 WELLES ROAD**  
**GROTON, CT 06340**  
**PROJECT TYPE**  
**PROPOSED 180' MONOPOLE TOWER**

**LOCATION & VICINITY MAPS**



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**APPROVALS**

LANDLORD		DATE
PROPERTY		DATE
CONSTRUCTION		DATE
RSM		DATE
TENANT		DATE
ZONING		DATE

**CALL TOLL FREE FOR CONNECTICUT**  
**1-800-922-4455 OR DIAL 811**  
 CALL TWO FULL WORKING DAYS IN ADVANCE TO LOCATE BURIED UTILITY PIPES AND CABLES

THE UTILITIES SHOWN HEREON ARE FOR THE CONTRACTORS CONVENIENCE ONLY THERE MAY BE OTHER UTILITIES NOT SHOWN ON THESE PLANS. THE ENGINEER/SURVEYOR ASSUMES NO RESPONSIBILITY FOR THE LOCATIONS SHOWN AND IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO VERIFY ALL UTILITIES WITHIN THE LIMITS OF THE WORK. ALL DAMAGE MADE TO EXISTING UTILITIES BY THE CONTRACTOR SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR.

APPLICANT/LESSEE:



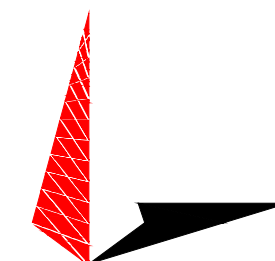
8051 CONGRESS AVENUE  
 BOCA RATON, FL 33487-1307  
 OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
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 (NEW LONDON COUNTY)

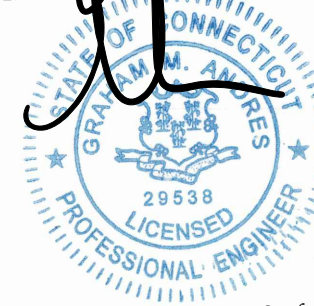
PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**

326 TRYON ROAD  
 RALEIGH, NC 27603-3530  
 OFFICE: (919) 661-6351  
 www.tepgroup.net

SEAL:



October 26, 2021

3	10-26-21	CONSTRUCTION
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SHEET TITLE:

**TITLE SHEET**

SHEET NUMBER:	REVISION:
<b>T-1</b>	<b>3</b>
	TEP #: 255888



**ABBREVIATIONS:**

AB	ANCHOR BOLT	GR	GRADE	SIM	SIMILAR
AC	ASPHALTIC CONCRETE	GYP	GYPSUM	SPECS	SPECIFICATIONS
A/C	AIR CONDITIONING	GFCI	GROUND FAULT CIRCUIT	SS	STAINLESS STEEL
ADJ	ADJUSTABLE		INTERRUPT	STL	STEEL
A.F.F.	ABOVE FINISH FLOOR	GND	GROUND	STOR	STORAGE
ARCH	ARCHITECTURAL	HC	HOLLOW CORE	STRUCT	STRUCTURAL
APPROX	APPROXIMATELY	HDW	HARDWARE	SUSP	SUSPENDED
A.G.L.	ABOVE GRADE LEVEL	HTR	HEATER	SW	SWITCH
A.M.S.L.	ABOVE MEAN SEA LEVEL	HM	HOLLOW METAL	SWBO	SWITCHBOARD
BD	BOARD	HORIZ	HORIZONTAL	THK	THICK
BLDG	BUILDING	HR	HOUR	TI	TENANT IMPROVEMENT
BLKG	BLOCKING	HT	HEIGHT	TMA	TOWER MOUNTED AMPLIFIER
BOT	BOTTOM	HV	HIGH VOLTAGE	TOS	TOP OF SURFACE
BSMT	BASEMENT	ID	INSIDE DIMENSION	TS	TUBE STEEL
BTS	BASE TRANSCIEVER STATION	INS	INSULATION	TYP	TYPICAL
		INT	INTERIOR	U	UNDERGROUND
C	COURSE(S)	JT	JOINT	UNO	UNLESS NOTED OTHERWISE
CEM	CEMENT	LAM	LAMINATED	VCT	VINYL COMPOSITION TILE
CL	CHAIN LINK	LBS	POUNDS	VERT	VERTICAL
CLG	CEILING	LT	LIGHT	V.I.F.	VERIFY IN FIELD
CLR	CLEAR	LA	LIGHTNING ARRESTOR	VG	VERTICAL GRAIN
COL	COLUMN	LNA	LOW NOISE AMPLIFIER	W/	WITH
CONC	CONCRETE	MFR	MANUFACTURER	WD	WOOD
CONST	CONSTRUCTION	MAT	MATERIAL	WR	WATER RESISTANT
CONT	CONTINUOUS	MAX	MAXIMUM	WT	WEIGHT
CORR	CORRIDOR	MECH	MECHANICAL	XFMR	TRANSFORMER
CO	CONDUIT ONLY	MIN	MINIMUM	⊙	AT
DIA	DIAMETER	MISC	MISCELLANEOUS	[	CHANNEL
DBL	DOUBLE	ML	METAL LATH	⊕	CENTERLINE
DEPT	DEPARTMENT	MO	MASONRY OPENING	∠	ANGLE
DEMO	DEMOLITION	MS	MACHINE SCREW	ℓ	PROPERTY LINE
DIM	DIMENSION	MTD	MOUNTED		
DN	DOWN	MTL	METAL		
DR	DOOR	(N)	NEW		
DTL	DETAIL	NIC	NOT IN CONTRACT		
DWG	DRAWING	NO	NUMBER		
(E)	EXISTING	NTS	NOT TO SCALE		
EA	EACH	O	OVERHEAD		
ELEC	ELECTRIC	OA	OVERALL		
ELEV	ELEVATION	O.C.	ON CENTER		
EQUIP	EQUIPMENT	OPNG	OPENING		
EXP	EXPANSION	OPP	OPPOSITE		
EXT	EXTERIOR	PARTN	PARTITION		
FA	FIRE ALARM	PL	PLATE		
FB	FLAT BAR	PLAS	PLASTER		
FF	FINISH FLOOR	PLYWD	PLYWOOD		
FH	FLAT HEAD	POC	POINT OF CONNECTION		
FIN	FINISH(ED)	PROP	PROPERTY		
FLR	FLOOR	PT	PRESSURE TREATED		
FOS	FACE OF STUDS	R	RISER		
FS	FINISH SURFACE	REQD	REQUIRED		
FT	FOOT, FEET	RD	ROOF DRAIN		
FTG	FOOTING	RM	ROOM		
FW	FINISH WALL	RMS	ROOMS		
F.G.	FINISH GRADE	RO	ROUGH OPENING		
FUT	FUTURE	SC	SOLID CORE		
GA	GAUGE	SCHED	SCHEDULE		
GALV	GALVANIZED	SECT	SECTION		
GL	GLASS	SHT	SHEET		

**SYMBOLS:**

	MASONRY
	BRICK
	CONCRETE
	EARTH
	STEEL
	GRAVEL
	CENTER LINE
	PROPERTY LINE
	LEASE LINE
	EASEMENT LINE
	RIGHT-OF-WAY
	CHAIN LINK FENCE
	WOOD FENCE
	SILT FENCE
	BELOW GRADE ELECTRIC
	BELOW GRADE TELEPHONE
	OVERHEAD ELECTRIC/TELEPHONE
	OVERHEAD TELEPHONE
	OVERHEAD ELECTRIC
	CONTOUR
	TREE PROTECTION FENCE
	TREE LINE
	TREES, SHRUBS, BUSHES
	SANITARY SEWER LINE
	WATER LINE
	NATURAL GAS LINE

APPLICANT/LESSEE:



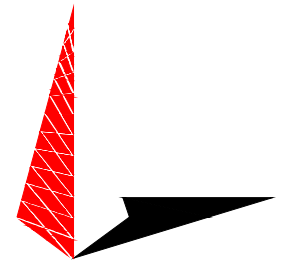
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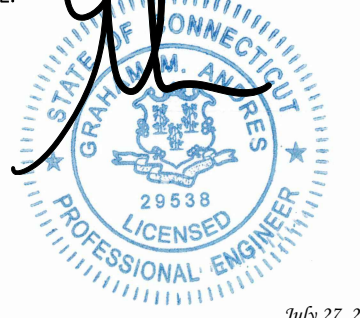
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**ABBREVIATIONS & SYMBOLS**

SHEET NUMBER: <b>N-1</b>	REVISION: <b>2</b> TEP #: 255888
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**ABBREVIATIONS & SYMBOLS**

SCALE: N.T.S.

**GENERAL NOTES:**

1. ALL REFERENCES MADE TO OWNER IN THESE DOCUMENTS SHALL BE CONSIDERED SBA COMMUNICATIONS OR IT'S DESIGNATED REPRESENTATIVE.
2. ALL WORK PRESENTED ON THESE DRAWINGS MUST BE COMPLETED BY THE CONTRACTOR UNLESS NOTED OTHERWISE. THE CONTRACTOR MUST HAVE CONSIDERABLE EXPERIENCE IN PERFORMANCE OF WORK SIMILAR TO THAT DESCRIBED HEREIN. BY ACCEPTANCE OF THIS ASSIGNMENT, THE CONTRACTOR IS ATTESTING THAT HE DOES HAVE SUFFICIENT EXPERIENCE AND ABILITY, THAT HE IS KNOWLEDGEABLE OF THE WORK TO BE PERFORMED AND THAT HE IS PROPERLY LICENSED AND PROPERLY REGISTERED TO DO THIS WORK IN THE STATE OF CONNECTICUT.
3. WORK SHALL BE COMPLETED IN ACCORDANCE WITH TIA/EIA-222-G STRUCTURAL STANDARDS FOR STEEL ANTENNA TOWERS AND ANTENNA SUPPORTING STRUCTURES, ASCE 7-05 MINIMUM DESIGN LOADS FOR BUILDINGS AND OTHER STRUCTURES AND THE INTERNATIONAL BUILDING CODE, 2015 EDITION.
4. UNLESS SHOWN OR NOTED OTHERWISE ON THE CONTRACT DRAWINGS, OR IN THE SPECIFICATIONS, THE FOLLOWING NOTES SHALL APPLY TO THE MATERIALS LISTED HEREIN, AND TO THE PROCEDURES TO BE USED ON THIS PROJECT.
5. ALL HARDWARE ASSEMBLY MANUFACTURER'S INSTRUCTIONS SHALL BE FOLLOWED EXACTLY AND SHALL SUPERSEDE ANY CONFLICTING NOTES ENCLOSED HEREIN.
6. IT IS THE CONTRACTOR'S SOLE RESPONSIBILITY TO DETERMINE ERECTION PROCEDURE AND SEQUENCE TO INSURE THE SAFETY OF THE STRUCTURE AND IT'S COMPONENT PARTS DURING ERECTION AND/OR FIELD MODIFICATIONS. THIS INCLUDES, BUT IS NOT LIMITED TO, THE ADDITION OF TEMPORARY BRACING, GUYS OR TIE DOWNS THAT MAY BE NECESSARY. SUCH MATERIAL SHALL BE REMOVED AND SHALL REMAIN THE PROPERTY OF THE CONTRACTOR AFTER THE COMPLETION OF THE PROJECT.
7. ALL DIMENSIONS, ELEVATIONS, AND EXISTING CONDITIONS SHOWN ON THE DRAWINGS SHALL BE FIELD VERIFIED BY THE CONTRACTOR PRIOR TO BEGINNING ANY MATERIALS ORDERING, FABRICATION OR CONSTRUCTION WORK ON THIS PROJECT. CONTRACTOR SHALL NOT SCALE CONTRACT DRAWINGS IN LIEU OF FIELD VERIFICATION. ANY DISCREPANCIES SHALL BE IMMEDIATELY BROUGHT TO THE ATTENTION OF THE OWNER AND THE OWNER'S ENGINEER. THE DISCREPANCIES MUST BE RESOLVED BEFORE THE CONTRACTOR IS TO PROCEED WITH THE WORK. THE CONTRACT DOCUMENTS DO NOT INDICATE THE METHOD OF CONSTRUCTION. THE CONTRACTOR SHALL SUPERVISE AND DIRECT THE WORK AND SHALL BE SOLELY RESPONSIBLE FOR ALL CONSTRUCTION MEANS, METHODS, TECHNIQUES, SEQUENCES, AND PROCEDURES. OBSERVATION VISITS TO THE SITE BY THE OWNER AND/OR THE ENGINEER SHALL NOT INCLUDE INSPECTION OF THE PROTECTIVE MEASURES OR THE PROCEDURES.
8. ALL MATERIALS AND EQUIPMENT FURNISHED SHALL BE NEW AND OF GOOD QUALITY, FREE FROM FAULTS AND DEFECTS AND IN CONFORMANCE WITH THE CONTRACT DOCUMENTS. ANY AND ALL SUBSTITUTIONS MUST BE PROPERLY APPROVED AND AUTHORIZED IN WRITING BY THE OWNER AND ENGINEER PRIOR TO INSTALLATION. THE CONTRACTOR SHALL FURNISH SATISFACTORY EVIDENCE AS TO THE KIND AND QUALITY OF THE MATERIALS AND EQUIPMENT BEING SUBSTITUTED.
9. THE CONTRACTOR SHALL BE RESPONSIBLE FOR INITIATING, MAINTAINING, AND SUPERVISING ALL SAFETY PRECAUTIONS AND PROGRAMS IN CONNECTION WITH THE WORK. THE CONTRACTOR IS RESPONSIBLE FOR INSURING THAT THIS PROJECT AND RELATED WORK COMPLIES WITH ALL APPLICABLE LOCAL, PROVINCIAL, AND FEDERAL SAFETY CODES AND REGULATIONS GOVERNING THIS WORK.
10. ACCESS TO THE PROPOSED WORK SITE MAY BE RESTRICTED. THE CONTRACTOR SHALL COORDINATE INTENDED CONSTRUCTION ACTIVITY, INCLUDING WORK SCHEDULE AND MATERIALS ACCESS, WITH THE SBA PROJECT MANAGER.
11. BILL OF MATERIALS AND PART NUMBERS LISTED ON CONSTRUCTION DRAWINGS ARE INTENDED TO AID CONTRACTOR/OWNER. CONTRACTOR/OWNER SHALL VERIFY PARTS AND QUANTITIES WITH MANUFACTURER PRIOR TO BIDDING AND/OR ORDERING MATERIALS.
12. THE CONTRACTOR SHALL REWORK (DRY, SCARIFY, ETC.) ALL MATERIAL NOT SUITABLE FOR SUBGRADE IN ITS PRESENT STATE. AFTER REWORKING, IF THE MATERIAL REMAINS UNSUITABLE, THE CONTRACTOR SHALL UNDERCUT THIS MATERIAL AND REPLACE WITH APPROVED MATERIAL. ALL SUBGRADES SHALL BE PROOF-ROLLED WITH A FULLY LOADED TANDEM AXLE DUMP TRUCK PRIOR TO PAVING. ANY SOFT MATERIAL SHALL BE REWORKED OR REPLACED.
13. THE CONTRACTOR IS REQUIRED TO MAINTAIN ALL PIPES, DITCHES, AND OTHER DRAINAGE STRUCTURES FREE FROM OBSTRUCTION UNTIL WORK IS ACCEPTED BY THE OWNER. THE CONTRACTOR IS RESPONSIBLE FOR ANY DAMAGES CAUSED BY FAILURE TO MAINTAIN DRAINAGE STRUCTURE IN OPERABLE CONDITION.
14. ALL MATERIALS AND WORKMANSHIP SHALL BE WARRANTED FOR ONE YEAR FROM ACCEPTANCE DATE.
15. ALL BUILDING/TOWER DIMENSIONS SHALL BE VERIFIED WITH THE PLANS (LATEST REVISION) PRIOR TO COMMENCING CONSTRUCTION. NOTIFY THE ENGINEER IMMEDIATELY IF ANY DISCREPANCIES ARE DISCOVERED. THE OWNER SHALL HAVE A SET OF APPROVED PLANS AVAILABLE AT THE SITE AT ALL TIMES WHILE WORK IS BEING PERFORMED. A DESIGNATED RESPONSIBLE EMPLOYEE SHALL BE AVAILABLE FOR CONTACT BY GOVERNING AGENCY INSPECTORS.
16. ANY BUILDINGS ON THIS SITE ARE INTENDED TO SHELTER EQUIPMENT WHICH WILL ONLY BE PERIODICALLY MAINTAINED, AND ARE NOT INTENDED FOR HUMAN OCCUPANCY.
17. TEMPORARY FACILITIES FOR PROTECTION OF TOOLS AND EQUIPMENT SHALL CONFORM TO LOCAL REGULATIONS AND SHALL BE THE CONTRACTOR'S RESPONSIBILITY.
18. RENTAL CHARGES, SAFETY, PROTECTION AND MAINTENANCE OF RENTED EQUIPMENT SHALL BE THE CONTRACTOR'S RESPONSIBILITY.
19. THE CONTRACTOR AND ITS SUBCONTRACTORS SHALL CARRY LIABILITY INSURANCE IN THE AMOUNTS AND FORM IN ACCORDANCE WITH GLOBALIVE SPECIFICATIONS. CERTIFICATES DEMONSTRATING PROOF OF COVERAGE SHALL BE PROVIDED TO GLOBALIVE PRIOR TO THE START OF THE WORK ON THE PROJECT.

20. THESE DOCUMENTS DO NOT INCLUDE THE NECESSARY COMPONENTS FOR CONSTRUCTION SAFETY. SAFETY, CARE OF ADJACENT PROPERTIES, AND COMPLIANCE WITH PROVINCIAL AND FEDERAL REGULATIONS REGARDING SAFETY, SHALL BE THE CONTRACTOR'S RESPONSIBILITY, AND THIS, PER THE INTERNATIONAL CODE - REGULATORS RESPECTING OCCUPATIONAL SAFETY & HEALTH THE SUCCESSFUL CONTRACTOR WILL SUBMIT HIT SAFETY MANUAL AT THE PROJECT SITE.
21. THE CONTRACTOR SHALL CONTACT ALL APPLICABLE UTILITY SERVICES TO VERIFY LOCATIONS OF EXISTING UTILITIES AND REQUIREMENTS FOR NEW UTILITY CONNECTIONS PRIOR TO EXCAVATING.
22. THE CONTRACTOR SHALL MAINTAIN THE JOB CLEAR OF TRASH AND DEBRIS. ALL WASTE MATERIALS SHALL BE REMOVED FROM THE SITE PRIOR TO SUBSTANTIAL COMPLETION AND PRIOR TO FINAL ACCEPTANCE. THE CONTRACTOR SHALL FURNISH ONE 55 GALLON BARREL, AND TRASH BAGS, AND SHALL REMOVE TRASH, DEBRIS, ETC., ON A DAILY BASIS.
23. COSTS FOR BUILDING PERMITS, LANDFILL TAXES, USE TAXES, SALES TAXES AND OTHER CHARGES RELATIVE TO CONSTRUCTION OF THIS PROJECT SHALL BE INCLUDED IN THE CONTRACT PRICE.
24. THE CONTRACTOR SHALL VISIT THE SITE AND BECOME FAMILIAR WITH ALL CONDITIONS PRIOR TO SUBMITTING HIS PROPOSAL. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS SHOWN ON THESE DRAWINGS WITH THOSE AT THE SITE. ANY VARIATION WHICH REQUIRES PHYSICAL CHANGE SHALL BE BROUGHT TO THE ATTENTION OF THE SBA PROJECT ENGINEER FOR FACILITIES/CONSTRUCTION.
25. THE CONTRACTOR SHALL GUARANTEE THE WORK PERFORMED ON THE PROJECT BY THE CONTRACTOR AND ANY OR ALL OF THE SUBCONTRACTORS WHO PERFORMED WORK FOR THE CONTRACTOR ON THIS PROJECT. THE GUARANTEE SHALL BE FOR A FULL YEAR FOLLOWING ISSUANCE OF THE FINAL PAYMENT OF HOLDBACK.
26. AWARDED CONTRACTOR WILL BE REQUIRED TO SIGN AND RETURN A COPY OF AN AWARD LETTER FOR SBA'S FILE.
27. CONTRACTOR WILL BE REQUIRED TO PROVIDE PROOF OF LICENSE TO PERFORM WORK IN JURISDICTION AT TIME OF BID AWARD.
28. CONTRACTOR WILL PROVIDE A CONSTRUCTION SCHEDULE PRIOR TO CONSTRUCTION STARTING AND WILL PROVIDE UPDATE/CHANGES (WITH EXPLANATIONS) TO THAT SCHEDULE WHEN/IF ITEMS ARE DELAYED OR PUSHED OUT.
29. CONTRACTOR WILL BE RESPONSIBLE TO PROVIDE SBA PROJECT MANAGERS WITH PHOTOS OF THE MAJOR CONSTRUCTION MILESTONES AS THEY OCCUR.
30. CONTRACTOR WILL BE RESPONSIBLE TO ASSIST IN COORDINATING AND OBTAINING PRIMARY POWER TO THE SITE PRIOR TO TOWER ERECTION BEFORE PROJECT COMPLETION. (ON SITE VISITS WITH UTILITY COMPANY REPRESENTATIVES AS NECESSARY, ETC...)
31. CONTRACTOR SHOULD BE PREPARED FOR RANDOM SBA SAFETY INSPECTIONS AT ALL TIMES.
32. CONTRACTOR IS EXPECTED TO MAINTAIN PROPER WORKING CONDITIONS AND PROCEDURES PER CONNECTICUT STANDARDS AT ALL TIMES.
33. CONTRACTOR WILL BE REQUIRED TO OBTAIN THE NECESSARY ELECTRICAL PERMITS AND INSPECTIONS AS REQUIRED BY JURISDICTION.
34. CONTRACTOR IS EXPECTED TO CLOSE-OUT THE JOB SITE AS QUICKLY AS POSSIBLE (OBTAINING A CERTIFICATE OF OCCUPANCY AS REQUIRED BY LOCAL MUNICIPALITY AND GETTING SBA'S REGIONAL SITE MANAGER'S SIGN-OFF/CHECKLIST APPROVAL ON THE SITE).
35. CONTRACTOR WILL PROVIDE A COMPLETED TOWER HEIGHT VERIFICATION FORM AND TAPE DROP WITHIN 24 HOURS OF REACHING OVERALL HEIGHT.
36. CONTRACTOR WILL UTILIZE ALL OF THE SBA PROVIDED DOCUMENTATION INCLUDING BUT NOT LIMITED TO: TOWER CONSTRUCTION ACCEPTANCE CHECKLIST, CONSTRUCTION SCHEDULE, CONSTRUCTION CLOSE-OUT LIST & TOWER HEIGHT VERIFICATION.
37. CONTRACTOR IS RESPONSIBLE FOR CONCRETE COMPRESSION TESTING.
38. CONTRACTOR IS RESPONSIBLE FOR GROUND MEG TESTING AND PROVIDING PROOF OF RESULT.
39. WHEN REQUESTED, PROVIDE 3 COPIES OF FABRICATION AND ERECTION DRAWINGS PRIOR TO FABRICATION. ALLOW UP TO 1 WEEK FOR REVIEW BY CONSULTANT.
40. IN ADDITION TO CONTRACTOR'S QUALITY CONTROL PROGRAM, INDEPENDENT TESTING AND INSPECTION MAY BE PERFORMED BY OWNER OR OWNER'S REPRESENTATIVE.
41. SUBMIT RED-LINES COPY OF CONSTRUCTION DRAWINGS UPON COMPLETION OF CONSTRUCTION HIGHLIGHTING CHANGES IN THE STAMPED AND SIGNED AS-BUILT CONDITION FROM SHOWN ON THE DRAWINGS.
42. CONTRACTOR WILL BE RESPONSIBLE FOR ALL GRADING AND FILL COMPACTION TESTING REQUIRED AS SET FORTH IN THE GEO TECHNOLOGICAL REPORT PROVIDED BY OWNER.

**CONCRETE:**

1. ALL CONCRETE AND CONCRETE MATERIALS SHALL CONFORM TO THE REQUIREMENTS OF INTERNATIONAL BUILDING CODE, 2015 EDITION.
2. THE CONTRACTOR SHALL TAKE SAMPLES OF THE CONCRETE POURED UNDER THE CONDITIONS OUTLINED IN THE INTERNATIONAL BUILDING CODE, 2015 EDITION.
3. ANY FAILURE OF A CONCRETE TEST CYLINDER TO MEET THE SPECIFIED STRENGTH REQUIREMENTS MUST BE REPORTED TO THE DESIGN ENGINEER IMMEDIATELY. CORRECTIVE ACTION MUST BE APPROVED BY THE ENGINEER AND ALL RELATED COSTS SHALL BE AT THE CONTRACTOR'S EXPENSE.

APPLICANT/LESSEE:



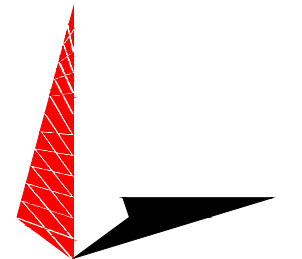
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**  
326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

SEAL:



REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB      CHECKED BY: JKW

SHEET TITLE:

**GENERAL NOTES I**

SHEET NUMBER:	REVISION:
<b>N-2</b>	<b>2</b>
	TEP #: 255888

## CONCRETE (CONTINUED):

- THE MINIMUM 28-DAY COMPRESSIVE STRENGTH OF THE CONCRETE SHALL BE A MINIMUM OF 30 MPA, EXCEPT AS NOTED OR DIRECTED IN THE SOIL REPORT. THE CONCRETE, WHEN POURED, SHALL CONTAIN 7% AIR ENTRAINMENT WITH AN ALLOWABLE VARIATION OF +2%.
- CONTRACTOR MUST TAKE SLUMP TEST AT LEAST ONCE FROM EACH TRANSIT MIXER AFTER A MINIMUM OF 5% CONCRETE LOAD HAD BEEN DISCHARGED. SLUMP, UNLESS NOTED OTHERWISE ON THE DRAWINGS, SHALL BE 75 MM.
- MIXED CONCRETE ON SITE (REMOTE AREAS) WITH THE CORRECT PROPORTION OF CEMENT, SAND, GRAVEL, AND AIR-ENTRAINING AGENT ALREADY ADDED, THE DRY PREMIX IS TO BE MIXED IN A CONCRETE BATCHER IN STRICT ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.
- BEFORE POURING CONCRETE, THE TRANSPORTING EQUIPMENT AND FORMS SHALL BE CLEANED AND ALL DEBRIS AND ICE SHALL BE REMOVED FROM PLACES TO BE OCCUPIED BY THE CONCRETE. ANY WATER THAT HAS ACCUMALATED IN THE FORMS SHALL BE REMOVED.
- ALL CONCRETE SHALL BE VIBRATED AND WORKED AROUND THE REINFORCEMENTS, EMBEDDED FIXTURES AND INTO THE CORNERS OF THE FORMS. ANY EXCESS WATER THAT ACCUMALATES WHILE THE CONCRETE IS BEING POURED SHALL BE REMOVED.
- THE DESIGN ENGINEER SHALL RECEIVE A MINIMUM OF 24 HOURS NOTICE OF EVERY POUR.
- THE CONCRETE IN FOUNDATIONS MUST BE POURED IN CONTINUOUS POURS BETWEEN CONSTRUCTION JOINTS. NO CONSTRUCTION JOINTS OTHER THAN THOSE SHOWN ON SITE SPECIFIC DRAWINGS WILL BE PERMITTED. THE CONTRACTOR SHALL PROVIDE EFFICIENT EQUIPMENT TO COMPLETE THE POURING OF EACH SECTION IN ONE CONTINUOUS POUR.
- ALL FRAMEWORK SHALL BE BUILT IN ACCORDANCE WITH THE INTERNATIONAL BUILDING CODE SHALL BE THOROUGHLY BRACED AND PLUMBED SO THAT THE FINISHED CONCRETE WILL CONFORM TO THE SHAPES, LINES, GRADES, AND DIMENSIONS INDICATED ON THE SITE DRAWINGS.
- FORMS AND SHORING SHALL NOT BE REMOVED UNTIL THE CONCRETE IS ADEQUATELY SET. THEIR REMOVAL SHALL BE DONE IN SUCH A MANNER AS TO ENSURE THE COMPLETE SAFETY OF THE STRUCTURE.
- FORMS WHICH SUPPORT THE WEIGHT OF THE CONCRETE, OR OF SUPERIMPOSED LOADS, SHALL NOT BE REMOVED UNTIL THE CONCRETE IS STRONG ENOUGH TO CARRY ITS OWN WEIGHT, AND SUCH SUPERIMPOSED LOADS AS MAY BE PLACED UPON IT.
- THE CONCRETE SHALL BE MAINTAINED IN A MOIST CONDITION FOR AT LEAST 5 DAYS AFTER IT HAS BEEN POURED.
- ALL SURFACES WHICH ARE NOT PROTECTED BY FORMS OR A SEALED WATERPROOF COATING SHALL BE KEPT MOIST BY CONTINUOUS SPRINKLING, OR OTHER MEANS SUCH AS COVERING WITH MOIST SAND, SAWDUST, OR BURLAP.
- WHERE NECESSARY, THE CONCRETE SHALL BE PROTECTED AGAINST THE WEATHER BY A FRAMED HOUSING, TARPULINS, OR OTHER SUITABLE COVERING.

## REINFORCING STEEL (REBAR):

- REINFORCING STEEL SHALL MEET CODE AND BE PLACED ACCORDING TO THE APPLICABLE DRAWINGS. THE MINIMUM THICKNESS OF CONCRETE OVER THE STEEL SHALL BE AT LEAST 3".
- ALL REINFORCEMENTS THAT ARE REQUIRED FOR A DAYS POUR ON CONCRETE SHALL BE SECURELY FIXED IN PLACE IN SUFFICIENT TIME TO PERMIT INSPECTION BEFORE CONCRETING BEGINS.
- THE DESIGN ENGINEER SHALL BE GIVEN 24 HOURS NOTICE BEFORE THE CONCRETE IS TO BE POURED. FAILURE TO COMPLY MAY NECESSITATE, BUT NOT BE LIMITED TO, THE REMOVAL OF THE POURED CONCRETE AT THE CONTRACTOR'S EXPENSE.

## GROUTING:

- WHERE GROUT IS INDICATED ON THE DRAWINGS UNDER STRUCTURAL BASE PLATES, THIS SHALL BE A NON-SHRINK, NON-FERROUS TYPE. METHODS OF MIXING AND PLACING MUST BE IN STRICT ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS.

## COLD WEATHER CONCRETING:

- THE CONTRACTOR SHALL PROVIDE AND HAVE ON THE SITE READY FOR USE, ADEQUATE EQUIPMENT FOR HEATING CONCRETE MATERIALS AND PROTECTING FRESH CONCRETE DURING FREEZING OR NEAR FREEZING WEATHER CONDITIONS, ACCORDING TO THE KENTUCKY BUILDING CODE, 2013 EDITION.
- ALL CONCRETE MATERIALS, REBAR, FORMS, FILLERS, AND THE EARTH WITH WHICH THE CONCRETE IS TO COME INTO CONTACT WITH, SHALL BE FREE FROM FROST AND ICE.
- WHENEVER THE SURROUNDING TEMPERATURE IS BELOW 39°F, ALL CONCRETE POURED IN THE FORMS SHALL HAVE A TEMPERATURE OF 68°F FOR 4 DAYS.
- THE HOUSING, COVERING, OR OTHER PROTECTION USED FOR THE CURING SHALL REMAIN IN PLACE AND INTACT FOR AT LEAST 24 HOURS AFTER THE ARTIFICIAL HEATING IS DISCONTINUED.

- SALT, CALCIUM CHLORIDE, OR OTHER CHEMICALS SHALL NOT BE USED IN THE CONCRETE MIX TO PREVENT THE WATER CONTENT FROM FREEZING.

## UTILITIES:

- CONTRACTOR SHALL CONTACT A SUBSURFACE UTILITY LOCATOR FOR LOCATION OF EXISTING UTILITIES PRIOR TO COMMENCEMENT OF ANY CONSTRUCTION ACTIVITIES. LOCATION OF EXISTING SEWER, WATER LINES, GAS LINES, CONDUITS OR OTHER STRUCTURES ACROSS, UNDERNEATH, OR OTHERWISE ALONG THE LINE OF PROPOSED WORK ARE NOT NECESSARILY SHOWN ON THE PLANS, AND IF SHOWN ARE ONLY APPROXIMATELY CORRECT. CONTRACTOR ASSUMES SOLE RESPONSIBILITY FOR VERIFYING LOCATION AND ELEVATION OF ALL UNDERGROUND UTILITIES (INCLUDING TEST PITS BY HAND IF NECESSARY) IN AREAS OF CONSTRUCTION PRIOR TO STARTING WORK. CONTACT ENGINEER IMMEDIATELY IF LOCATION OF ELEVATION IS DIFFERENT FROM THAT SHOWN ON THE PLANS, OR IF THERE APPEARS TO BE A CONFLICT.
- CONTRACTOR SHALL COORDINATE ALL UTILITY CONNECTIONS WITH APPROPRIATE UTILITY OWNERS AND CONSTRUCTION MANAGER.
- DAMAGE BY THE CONTRACTOR TO UTILITIES OR PROPERTY OF OTHERS, INCLUDING EXISTING PAVEMENT AND OTHER SURFACES DISTURBED BY THE CONTRACTOR DURING CONSTRUCTION SHALL BE REPAIRED TO PRE-CONSTRUCTION CONDITIONS BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE CLIENT. FOR GRASSES AREAS, SEED AND MULCH SHALL BE ACCEPTABLE.
- THE CONTRACTOR SHALL COORDINATE WITH THE OWNER THE REQUIREMENTS FOR AND LIMITS OF OVERHEAD AND/OR UNDERGROUND ELECTRICAL SERVICE.
- THE CONTRACTOR SHALL COORDINATE THE LOCATION OF NEW UNDERGROUND TELEPHONE SERVICE WITH THE TELEPHONE UTILITY AND THE OWNER'S REQUIREMENTS.
- ALL UNDERGROUND UTILITIES SHALL BE INSTALLED AND TESTED SATISFACTORY PRIOR TO COMMENCING ANY PAVING OPERATIONS WHERE SUCH UTILITIES ARE WITHIN THE LIMITS OF PAVEMENT.

## GRADING:

- THE CONTRACTOR SHALL REWORK (DRY, SCARIFY, ETC...) ALL MATERIAL NOT SUITABLE FOR SUB GRADE IN ITS PRESENT STATE. IF THE MATERIAL, AFTER REWORKING, REMAINS UNSUITABLE THEN THE CONTRACTOR SHALL UNDERCUT THIS MATERIAL AND REPLACE WITH APPROVED MATERIAL AT HIS EXPENSE. ALL SUB GRADES SHALL BE PROOF ROLLED WITH A FULLY LOADED TANDEM AXLE DUMP TRUCK PRIOR TO PAVING. ANY SOFT MATERIAL SHALL BE REWORKED OR REPLACED.
- THE CONTRACTOR IS REQUIRED TO MAINTAIN ALL DITCHES, PIPES, AND OTHER DRAINAGE STRUCTURES FREE FROM OBSTRUCTION UNTIL WORK IS ACCEPTABLE BY THE OWNER. THE CONTRACTOR IS RESPONSIBLE FOR ANY DAMAGES CAUSED BY FAILURE TO MAINTAIN DRAINAGE STRUCTURES IN OPERABLE CONDITION.
- ALL MATERIALS AND WORKMANSHIP SHALL BE WARRANTED FOR ONE (1) YEAR FROM DATE OF ACCEPTANCE.

## GROUNDING:

- CONTRACTOR SHALL VERIFY THAT GROUNDING ELECTRODES SHALL BE CONNECTED IN A RING USING #2 SOLID TINNED COPPER WIRE. THE TOP OF THE GROUND RODS AND THE RING CONDUCTOR SHALL BE 2 FEET BELOW FINISHED GRADE. GROUNDING ELECTRODES SHALL BE DRIVEN ON 15'-0" CENTERS (PROVIDE AND INSTALL AS REQUIRED PER TYPICAL GROUNDING PLAN ON SHEET E-3).
- BONDING OF THE GROUNDING CONDUCTOR (NEUTRAL) AND THE GROUNDING CONDUCTOR SHALL BE AT THE SERVICE DISCONNECTING MEANS. BONDING JUMPER SHALL BE INSTALLED PER CSA.
- GROUND RING CONNECTION CONDUCTORS SHALL BE OF EQUAL LENGTH, MATERIAL, AND BONDING TECHNIQUE.
- CONTRACTOR SHALL ENSURE GROUND RING IS WITHIN 12 TO 36 INCHES OF THE EQUIPMENT PAD. PROVIDE AND INSTALL GROUNDING CONNECTIONS SHOWN IN DETAILS AS NEEDED PER EXISTING SITE GROUNDING SYSTEM. CONTRACTOR SHALL VERIFY ALL EXISTING SITE GROUNDING CONDITIONS BEFORE STARTING WORK OR PURCHASING EQUIPMENT.
- BOND CIGBE TO EXTERNAL GROUND RING WITH 2 RUNS OF #2 SOLID TINNED COPPER CONDUCTOR IN PVC. CONNECT BAR END WITH 2 HOLE LUG, AND "CADWELD" THE OTHER END TO THE EXTERNAL GROUND ROD.
- THE PREFERRED LOCATION FOR COAX GROUNDING IS AT THE BASE OF THE TOWER PRIOR TO THE COAX BEND. BONDING IS SHOWN ON THE ICE BRIDGE DUE TO DIFFICULTY WITH WELDING OR ATTACHING TO TOWER LEGS. CONTRACTOR SHALL ADVISE CONSTRUCTION MANAGER PRIOR TO PLACING CIGBE ON ICE BRIDGE IF MOUNTING TO TOWER LEG IS POSSIBLE.
- CONTRACTOR SHALL VERIFY EXISTING GROUNDING BOND TO THE FENCE POST OR EXTERNAL GROUND RING IN AT (2) PLACES. PROVIDE AND INSTALL GROUNDING CONNECTIONS AS REQUIRED TO MEET THESE CONDITIONS.

APPLICANT/LESSEE:



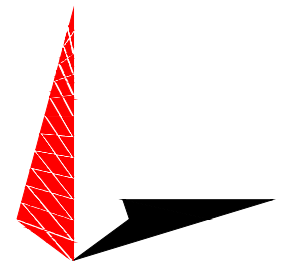
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

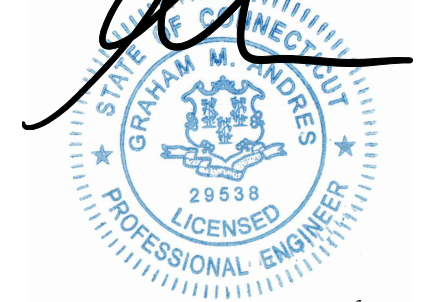
PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**

326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

SEAL:



REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB CHECKED BY: JKW

SHEET TITLE:

**GENERAL  
NOTES II**

SHEET NUMBER:

**N-3**

REVISION:

**2**

TEP #: 255888



NORTH

0 150 300

1 INCH = 150FT.  
GRAPHIC SCALE

Now or Formerly:  
TOWN OF GROTON  
313 509  
GROT M: 271010354427 E

Surveyed  
Boundary  
Walls

P/L

VESTED IN:  
TOWN OF GROTON  
137 622  
GROT M:  
271014348692 L:E

Now or Formerly:  
TOWN OF GROTON  
329 66  
GROT M: 271014344560 E

P/L

Now or Formerly:  
SILVER OAK LLC  
1142 068  
GROT M: 271014344077

Now or Formerly:  
STATE OF CONNECTICUT HIGHWAY  
GARAGE/GRAVEL BANK  
157 62  
GROT M: 271014440179 L:E

Now or Formerly:  
TERRY R. KOTFER & LAURIE KOTFER  
648 576  
GROT M: 271014445446

P/L

Approximate location of  
100' X 100' Lease Area  
Per Lease Documents

Now or Formerly:  
TOWN OF GROTON  
529 533  
GROT M: 271014448906 E

~ Wooded Area ~

Approximate location of 40'  
Access & Utility Easement  
Per Lease Documents

Existing  
Building

Concrete  
Monument Found

Existing  
Gate

Welles Road  
Public Right-of-Way

### PROPOSED TOWER 1A:

Latitude: 41° 23' 34.193" North (41.392831° NAD 83)  
Longitude: 71° 58' 12.031" West (-71.970009° NAD 83)  
Ground Elevation: 52.8' A.M.S.L.

### SPECIFIC PURPOSE SURVEY

130 Welles Road, Groton, Connecticut

Site Name: CT46142-A SOUTH LEDYARD



Millman Surveying, Inc.  
Corporate Headquarters  
4111 Bradley Circle NW, Suite 240  
Canton, Ohio 44718  
Phone: 800-520-1010  
www.millmanland.com

Drawn By: JK

Date: 10/21/20

Checked: WFO

MSI Project No. 47163

PM: JMK PC: AFM

Scale: 1:150

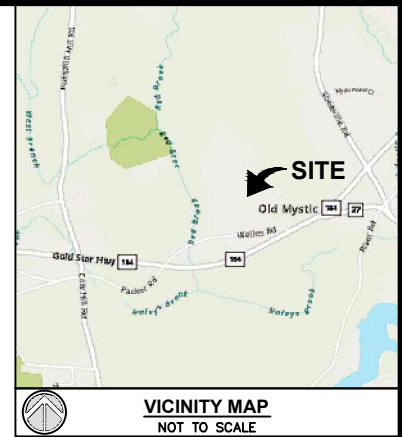
Sheet: 1 of 2

Prepared For:

TOWER ENGINEERING  
PROFESSIONALS, INC.

### SYMBOL LEGEND

- R/W - Right-of-Way
- P/L - Adjoiner Property Line
- - Monumentation Found as Noted
- ou— - Overhead Utilities
- ⊕ - Utility Pole
- [Dotted Box] - Building Area
- ~ ~ ~ - Treeline
- X— - Chain Link Fence



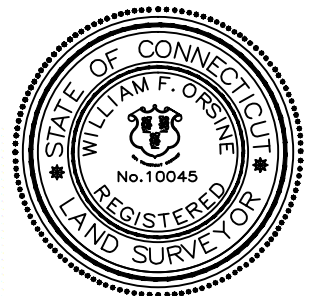
### NOTES:

1. This is a specific purpose survey for the stated purpose of surveying an existing telecommunication tower compound as requested by the client.
2. This is not a Boundary survey. Property lines are approximated due to poor deed description and lack of existing monumentation.
3. This survey was prepared without the benefit of a current title commitment.
4. The locations of all utilities shown on the survey are from visible surface evidence only.
5. No Wetlands Areas have been investigated by the Survey.
6. The bearings and geodetic coordinated shown hereon are in the North American Datum of 1983 (2011 Adjustment), based upon a GNSS static session on October 13, 2020.

### FLOOD ZONE:

By scaled map location and graphic plotting only, the subject property appears to lie entirely in Zone X (Areas of minimal flood hazard) according to the Flood Insurance Rate Map for the County of New London County, Community Panel No. 09011C0388J, Effective Date August 5, 2013.

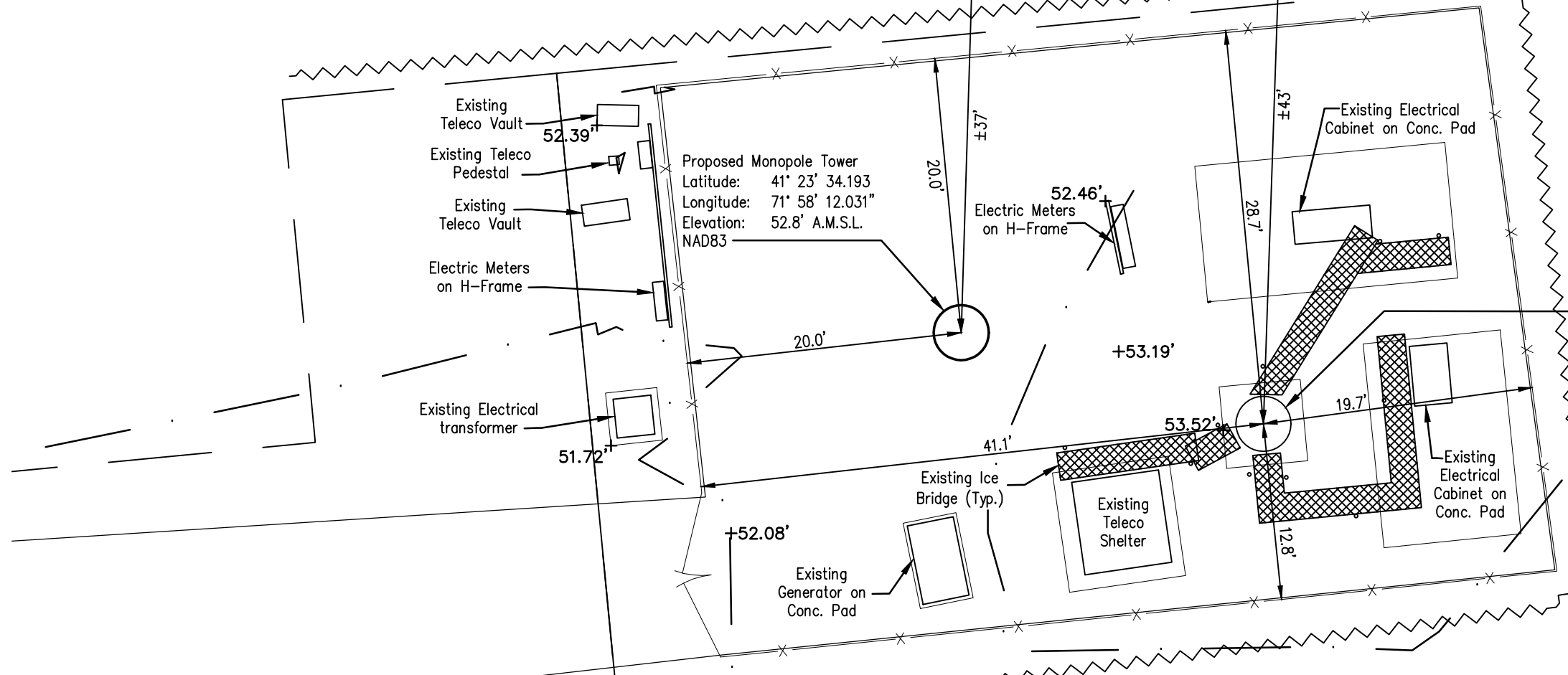
### CERTIFICATION:



By: \_\_\_\_\_  
William F. Orsine, PLS  
Connecticut Professional Land Surveyor No. 10045  
For and on behalf of Millman Surveying, Inc.

Now or Formerly:  
TOWN OF GROTON  
313 509  
GROT M: 271010354427 E

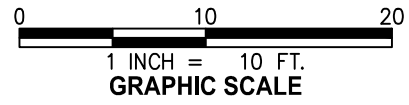
Approximate location of  
100' X 100' Lease Area  
Per Lease Documents



Existing Monopole Tower  
Latitude: 41° 23' 34.136"  
Longitude: 71° 58' 11.743"  
Elevation: 53.19' A.M.S.L.  
NAD83

VESTED IN:  
TOWN OF GROTON  
137 622  
GROT M:  
271014348692 L:E

Approximate location of 40'  
Access & Utility Easement  
Per Lease Documents



**SPECIFIC PURPOSE SURVEY**  
130 Welles Road, Groton, Connecticut  
Site Name: CT46142-A SOUTH LEDYARD



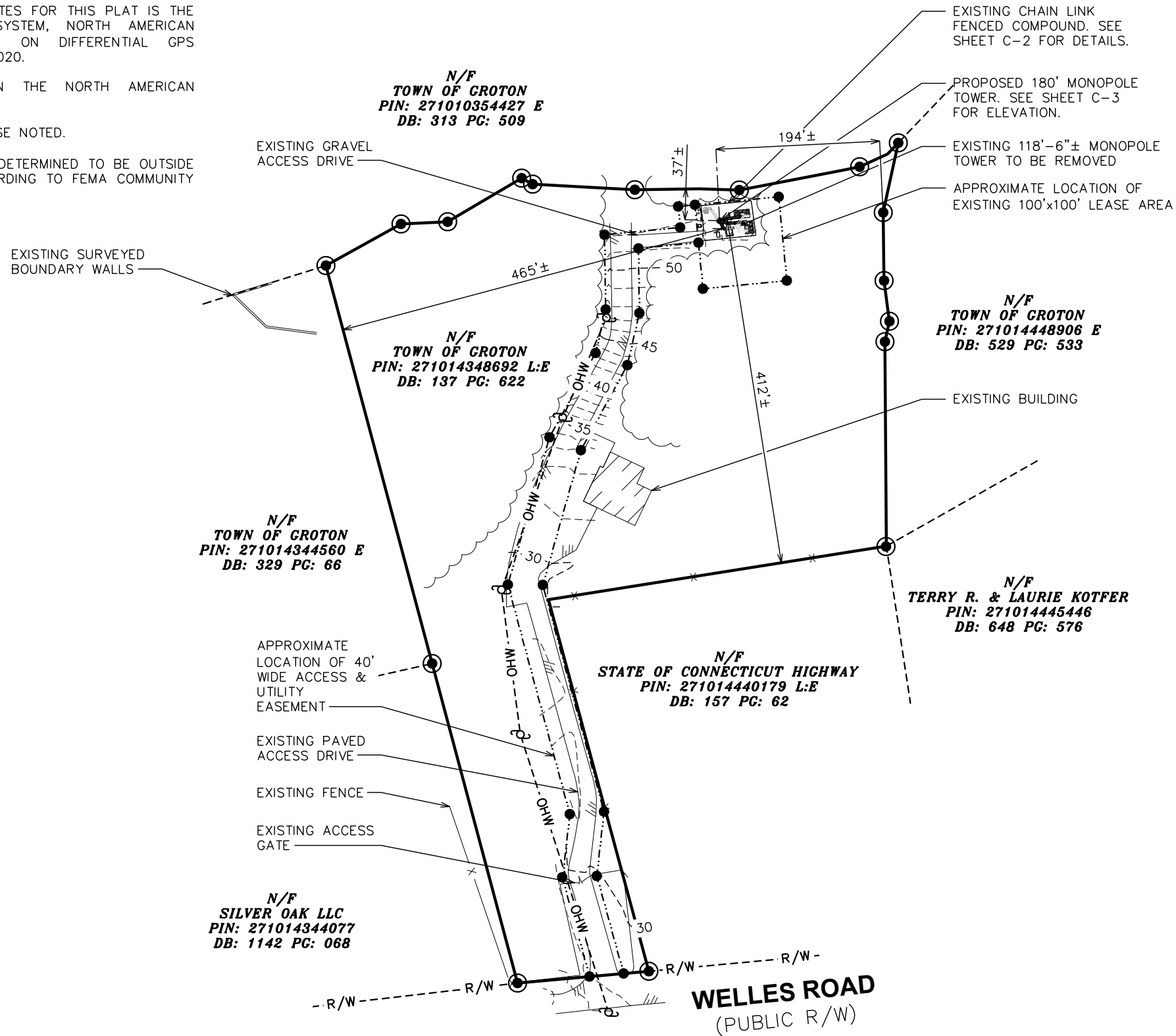
Millman Surveying, Inc.  
Corporate Headquarters  
4111 Bradley Circle NW, Suite 240  
Canton, Ohio 44718  
Phone: 800-520-1010  
www.millmanland.com

Drawn By: JK	PM: JMK PC: AFM
Date: 10/21/20	Scale: 1:10
Checked: WFO	Sheet: 2 of 2
MSI Project No. 48163	

Prepared For:  
**TOWER ENGINEERING  
PROFESSIONALS, INC.**

**NOTES:**

1. THE BASIS OF THE MERIDIANS AND COORDINATES FOR THIS PLAT IS THE CONNECTICUT STATE PLANE COORDINATE SYSTEM, NORTH AMERICAN DATUM 1983 (CTSPCS NAD 83), BASED ON DIFFERENTIAL GPS OBSERVATIONS PERFORMED ON OCTOBER 13, 2020.
2. VERTICAL INFORMATION SHOWN, BASED ON THE NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD '88) IN FEET.
3. ALL DISTANCES ARE GROUND UNLESS OTHERWISE NOTED.
4. THE TOWER IS LOCATED IN ZONE "X." AREAS DETERMINED TO BE OUTSIDE THE 0.2% ANNUAL CHANCE FLOODPLAIN ACCORDING TO FEMA COMMUNITY PANEL #09011C0388J, DATED AUGUST 5, 2013.



APPLICANT/LESSEE:



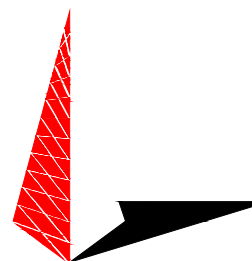
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**  
326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

SEAL:



October 26, 2021

3	10-26-21	CONSTRUCTION
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY
REV	DATE	ISSUED FOR:

DRAWN BY: GLB CHECKED BY: JKW

SHEET TITLE:

**SITE PLAN**

SHEET NUMBER: REVISION:

**C-1**

**3**

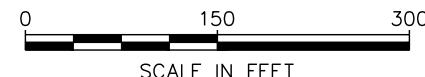
TEP #: 255888

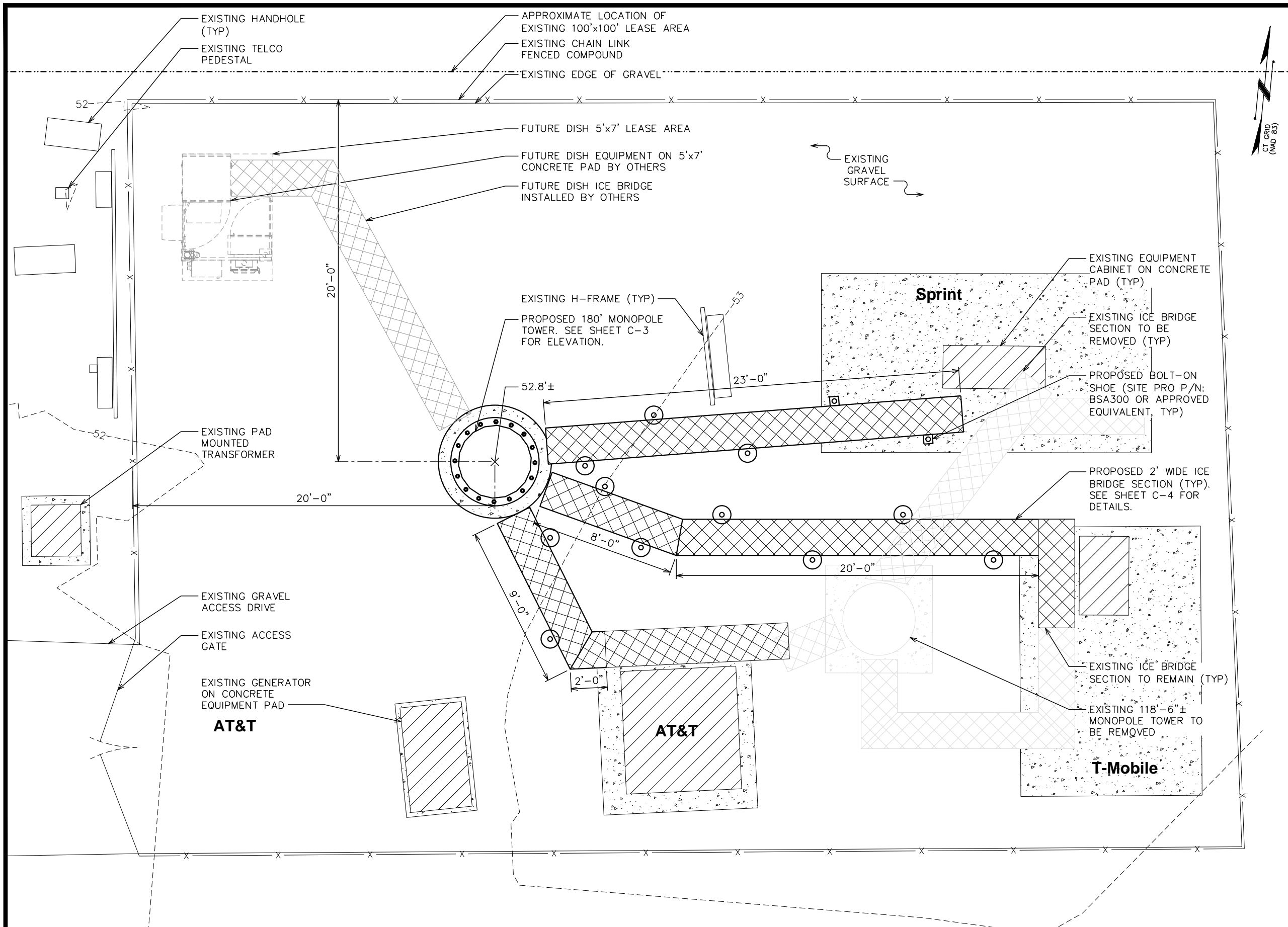
**LEGEND**

- EXIST. PROPERTY LINE
- - - ADJ. PROPERTY LINE
- ⊙ EXIST. UTILITY POLE
- ⊙ EXIST. LIGHT POLE
- ⊙ EXIST. HYDRANT
- ⊙ EXIST. TELCO PEDESTAL
- ⊙ PROPERTY CORNER
- LEASE/EASE. CORNER
- - -200- - - EXIST. CONTOUR LINE
- //— EDGE OF PAVEMENT
- - -OHW- - - OVERHEAD WIRE
- - -R/W- - - RIGHT-OF-WAY
- X - CHAIN LINK FENCE
- ~ ~ ~ EXISTING TREE LINE

**SITE PLAN**

SCALE: 1" = 150'





APPLICANT/LESSEE:

**SBA**

8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

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3	10-26-21	CONSTRUCTION
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1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY
REV	DATE	ISSUED FOR:

DRAWN BY: GLB CHECKED BY: JKW

SHEET TITLE:

**COMPOUND DETAIL**

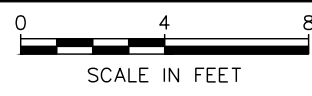
SHEET NUMBER: **C-2**

REVISION: **3**

TEP #: 255888

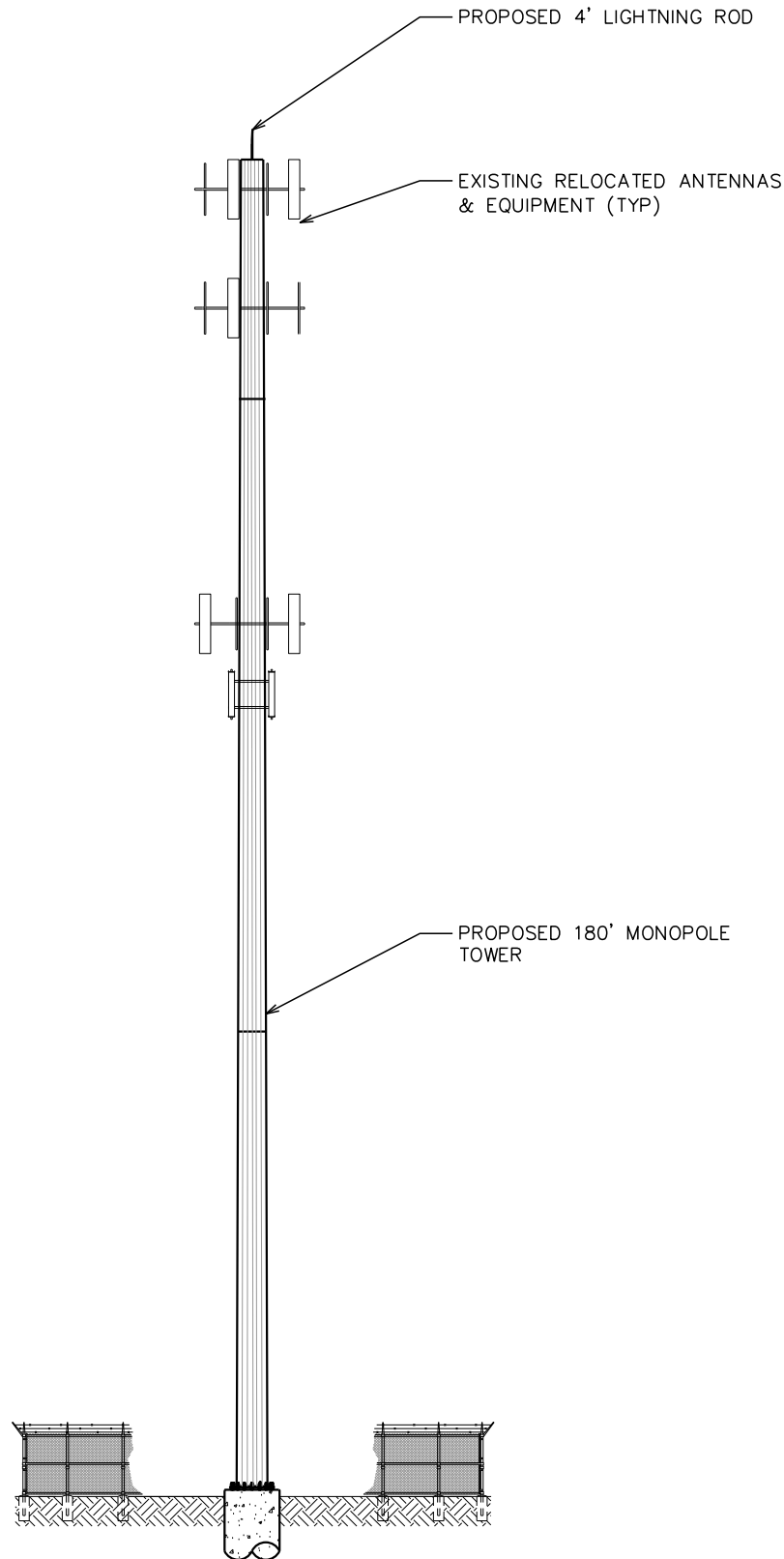
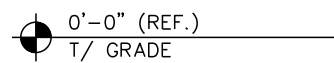
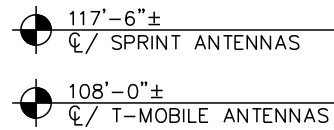
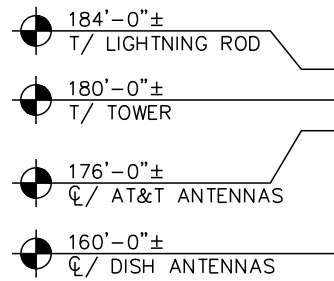
**COMPOUND DETAIL**

SCALE: 3/16" = 1'-0"



**NOTES:**

1. PROPOSED CABLES TO BE RUN PER SPECIFICATIONS OF PASSING STRUCTURAL ANALYSIS.
2. TOWER SHALL BE CONSTRUCTED OF GALVANIZED STEEL OR PAINTED PER APPLICABLE STANDARDS OF THE FAA OR OTHER APPLICABLE FEDERAL OR STATE AGENCY.
3. TOWER ELEVATION SHOWN FOR REFERENCE ONLY. VERIFY ACTUAL TOWER DESIGN & LOADING WITH TOWER DRAWINGS FROM MANUFACTURER AND/OR PASSING STRUCTURAL ANALYSIS PRIOR TO CONSTRUCTION.



APPLICANT/LESSEE:



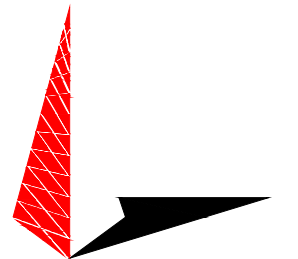
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

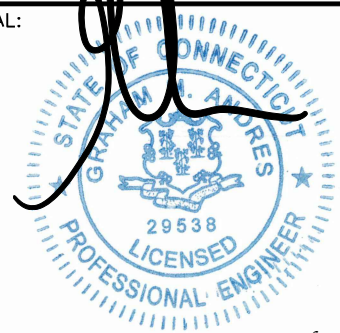
PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**

326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

SEAL:



REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB CHECKED BY: JKW

SHEET TITLE:

**TOWER ELEVATION**

SHEET NUMBER:

**C-3**

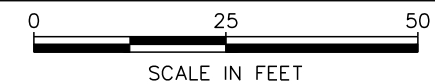
REVISION:

**2**

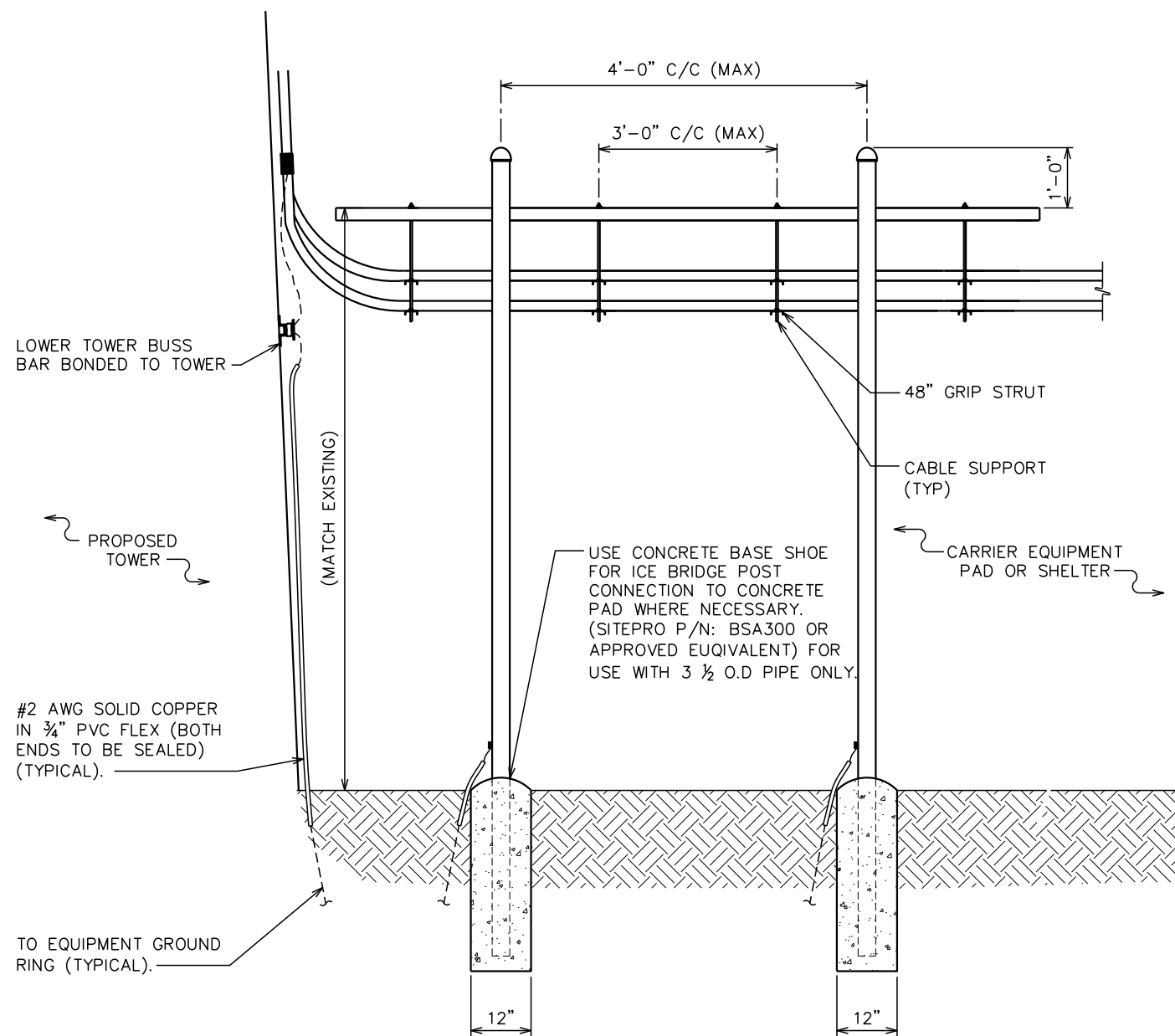
TEP #: 255888

**TOWER ELEVATION**

SCALE: 1" = 25'-0"

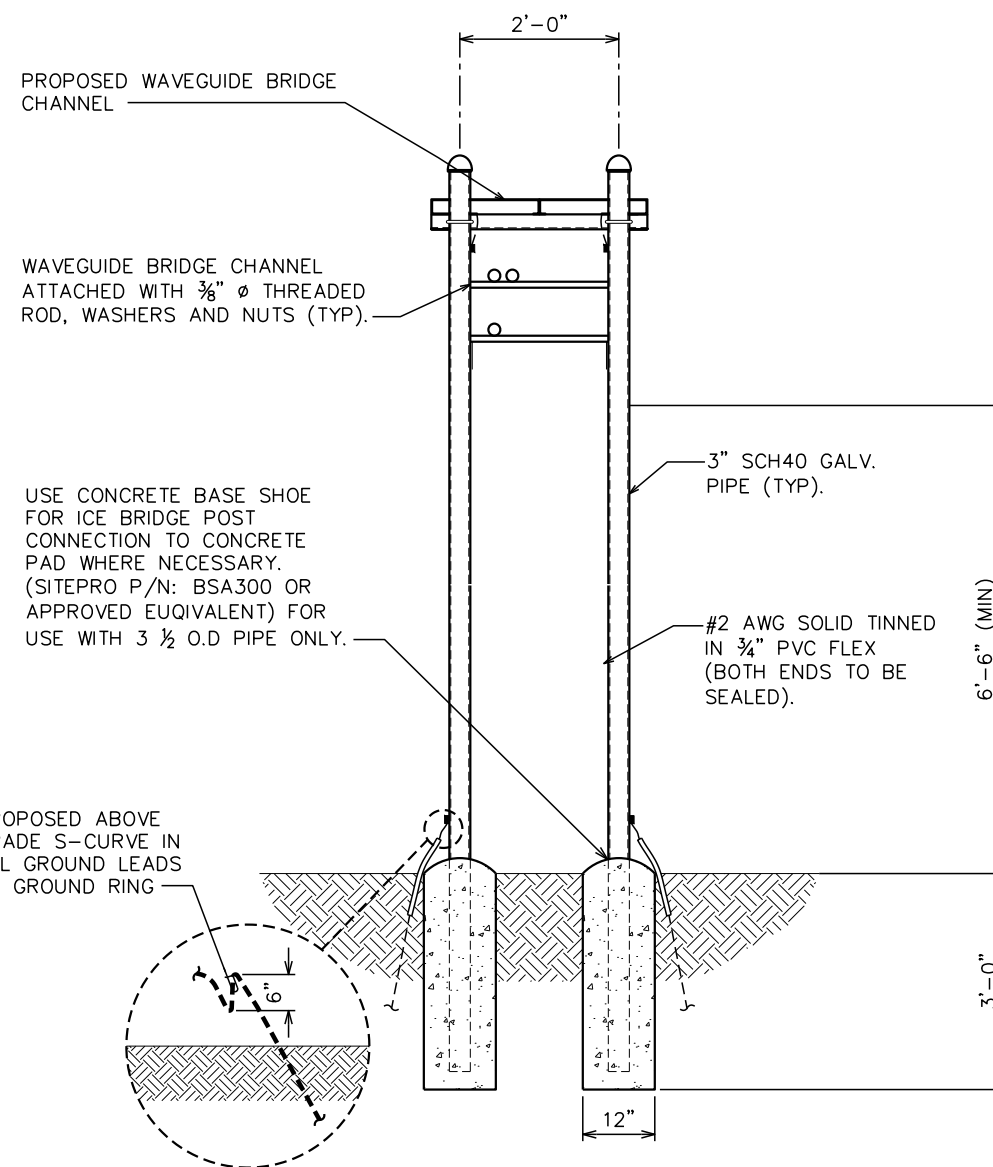






**ICE BRIDGE DETAIL (SIDE VIEW)**

SCALE: N.T.S



**ICE BRIDGE DETAIL (FRONT VIEW)**

SCALE: N.T.S

APPLICANT/LESSEE:



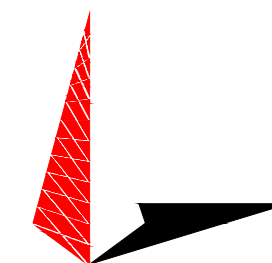
8051 CONGRESS AVENUE  
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130 WELLES ROAD  
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PLANS PREPARED BY:



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SHEET TITLE:

**ICE BRIDGE  
DETAILS**

SHEET NUMBER: \_\_\_\_\_ REVISION: \_\_\_\_\_

**C-4**

**2**

TEP #: 255888

**SCOPE:**

1. PROVIDE LABOR, MATERIALS, INSPECTION, AND TESTING TO PROVIDE CODE COMPLIANCE FOR ELECTRIC, TELEPHONE, AND GROUNDING/LIGHTNING SYSTEMS.

**CODES:**

1. THE INSTALLATION SHALL COMPLY WITH APPLICABLE LAWS AND CODES. THESE INCLUDE BUT ARE NOT LIMITED TO THE LATEST ADOPTED EDITIONS OF:
  - A. THE NATIONAL ELECTRICAL SAFETY CODE
  - B. THE NATIONAL ELECTRIC CODE – NFPA-70
  - C. REGULATIONS OF THE SERVING UTILITY COMPANY
  - D. LOCAL AND STATE AMENDMENTS
  - E. THE INTERNATIONAL ELECTRIC CODE – IEC (WHERE APPLICABLE)
2. PERMITS REQUIRED SHALL BE OBTAINED BY THE CONTRACTOR.
3. AFTER COMPLETION AND FINAL INSPECTION OF THE WORK, THE OWNER SHALL BE FURNISHED A CERTIFICATE OF COMPLETION AND APPROVAL.

**TESTING:**

1. UPON COMPLETION OF THE INSTALLATION, OPERATE AND ADJUST THE EQUIPMENT AND SYSTEMS TO MEET SPECIFIED PERFORMANCE REQUIREMENTS. THE TESTING SHALL BE DONE BY QUALIFIED PERSONNEL.

**GUARANTEE:**

1. IN ADDITION TO THE GUARANTEE OF THE EQUIPMENT BY THE MANUFACTURER, EACH PIECE OF EQUIPMENT SPECIFIED HEREIN SHALL ALSO BE GUARANTEED FOR DEFECTS OF MATERIAL OR WORKMANSHIP OCCURRING DURING A PERIOD OF ONE (1) YEAR FROM FINAL ACCEPTANCE OF THE WORK BY THE OWNER AND WITHOUT EXPENSE TO THE OWNER.
2. THE WARRANTEE CERTIFICATES & GUARANTEES FURNISHED BY THE MANUFACTURERS SHALL BE TURNED OVER TO THE OWNER.

**UTILITY CO-ORDINATION:**

1. CONTRACTOR SHALL COORDINATE WORK WITH THE POWER AND TELEPHONE COMPANIES AND SHALL COMPLY WITH THE SERVICE REQUIREMENTS OF EACH UTILITY COMPANY.

**EXAMINATION OF SITE:**

1. PRIOR TO BEGINNING WORK, THE CONTRACTOR SHALL VISIT THE SITE OF THE JOB AND SHALL FAMILIARIZE HIMSELF WITH THE CONDITIONS AFFECTING THE PROPOSED ELECTRICAL INSTALLATION AND SHALL MAKE PROVISIONS AS TO THE COST THEREOF. FAILURE TO COMPLY WITH THE INTENT OF THIS SECTION WILL IN NO WAY RELIEVE THE CONTRACTOR OF PERFORMING THE WORK NECESSARY FOR A COMPLETE AND WORKING SYSTEM OR SYSTEMS.

**CUTTING, PATCHING AND EXCAVATION:**

1. COORDINATION OF SLEEVES, CHASES, ETC., BETWEEN SUBCONTRACTORS WILL BE REQUIRED PRIOR TO THE CONSTRUCTION OF ANY PORTION OF THE WORK. CUTTING AND PATCHING OF WALLS, PARTITIONS, FLOORS, AND CHASES IN CONCRETE, WOOD, STEEL OR MASONRY SHALL BE DONE AS PROVIDED ON THE DRAWINGS.
2. NECESSARY EXCAVATIONS AND BACKFILLING INCIDENTAL TO THE ELECTRICAL WORK SHALL BE PROVIDED BY THE ELECTRICAL CONTRACTOR UNLESS SPECIFICALLY NOTED OTHERWISE ON THE DRAWING.
3. SEAL PENETRATIONS THROUGH RATED WALLS, FLOORS, ETC., WITH APPROVED METHOD AS LISTED BY UL.

**RACEWAYS / CONDUITS GENERAL:**

1. CONDUCTORS SHALL BE INSTALLED IN LISTED RACEWAYS. CONDUIT SHALL BE RIGID STEEL, EMT, SCH40 PVC, OR SCH80PVC AS INDICATED ON THE DRAWINGS. THE RACEWAY SYSTEM SHALL BE COMPLETE BEFORE INSTALLING CONDUCTORS.
2. EXTERIOR RACEWAYS AND GROUNDING SLEEVES SHALL BE SEALED AT POINTS OF ENTRANCE AND EXIT. THE RACEWAY SYSTEM SHALL BE BONDED PER NEC.

**EXTERIOR CONDUIT:**

1. EXPOSED CONDUIT SHALL BE NEATLY INSTALLED AND RUN PARALLEL OR PERPENDICULAR TO STRUCTURAL ELEMENTS. SUPPORTS AND MOUNTING HARDWARE SHALL BE HOT DIPPED GALVANIZED STEEL.
2. THE CONDUIT SHALL BE RIGID STEEL AT GRADE TRANSITIONS OR WHERE EXPOSED TO DAMAGE.
3. UNDERGROUND CONDUITS SHALL BE RIGID STEEL, SCH40 PVC, OR SCH80 PVC AS INDICATED ON THE DRAWINGS.
4. BURIAL DEPTH OF CONDUITS SHALL BE AS REQUIRED BY CODE FOR EACH SPECIFIC CONDUIT TYPE AND APPLICATION, BUT SHALL NOT BE LESS THAN THE FROST DEPTH AT THE SITE.
5. CONDUIT ROUTES ARE SCHEMATIC. CONTRACTOR SHALL FIELD VERIFY ROUTES BEFORE BID. COORDINATE ROUTE WITH WIRELESS CARRIER AND/OR BUILDING OWNER.

**INTERIOR CONDUIT:**

1. CONCEALED CONDUIT IN WALLS OR INTERIOR SPACES ABOVE GRADE MAY BE EMT OR PVC.
2. CONDUIT RUNS SHALL USE APPROVED COUPLINGS AND CONNECTORS. PROVIDE INSULATED BUSHING FOR ALL CONDUIT TERMINATIONS. CONDUIT RUNS IN A WET LOCATION SHALL HAVE WATERPROOF FITTINGS.
3. PROVIDE SUPPORTS FOR CONDUITS IN ACCORDANCE WITH NEC REQUIREMENTS. CONDUITS SHALL BE SIZED AS REQUIRED BY NEC.

**EQUIPMENT:**

1. DISCONNECT SWITCHES SHALL BE SERVICE ENTRANCE RATED, HEAVY DUTY TYPE.
2. CONTRACTOR SHALL VERIFY MAXIMUM AVAILABLE FAULT CURRENT AND COORDINATE INSTALLATION WITH THE WORK. CONTRACTOR WILL VERIFY THAT EXISTING CIRCUIT BREAKERS ARE RATED FOR MORE THAN AVAILABLE NECESSARY.
3. NEW CIRCUIT BREAKERS SHALL BE RATED TO WITHSTAND THE MAXIMUM AVAILABLE FAULT CURRENT AS DETERMINED BY THE UTILITY.

**CONDUCTORS:**

1. FURNISH AND INSTALL CONDUCTORS SPECIFIED IN THE DRAWINGS. CONDUCTORS SHALL BE COPPER AND SHALL HAVE TYPE THWN (MIN) (75° C) INSULATION, RATED FOR 600 VOLTS.
2. THE USE OF ALUMINUM CONDUCTORS SHALL BE LIMITED TO THE SERVICE FEEDERS INSTALLED BY THE UTILITY.
3. CONDUCTORS SHALL BE PROVIDED AND INSTALLED AS FOLLOWS:
  - A. MINIMUM WIRE SIZE SHALL BE #12 AWG.
  - B. CONDUCTORS SIZE #8 AND LARGER SHALL BE STRANDED. CONDUCTORS SIZED #10 AND #12 MAY BE SOLID OR STRANDED.
  - C. CONNECTION FOR #10 AWG #12 AWG SHALL BE BY TWISTING TIGHT AND INSTALLING INSULATED PRESSURE OR WIRE NUT CONNECTIONS.
  - D. CONNECTION FOR #8 AWG AND LARGER SHALL BE BY USE OF STEEL CRIMP-ON SLEEVES WITH NYLON INSULATOR.
3. CONDUCTORS SHALL BE COLOR CODED IN ACCORDANCE WITH NEC STANDARDS.

**UL COMPLIANCE:**

1. ELECTRICAL MATERIALS, DEVICES, CONDUCTORS, APPLIANCES, AND EQUIPMENT SHALL BE LABELED/LISTED BY UL OR ACCEPTED BY JURISDICTION (I.E., LOCAL COUNTY OR STATE) APPROVED THIRD PARTY TESTING AGENCY.

**GROUNDING:**

1. ELECTRICAL NEUTRALS, RACEWAYS AND NON-CURRENT CARRYING PARTS OF ELECTRICAL EQUIPMENT AND ASSOCIATED ENCLOSURES SHALL BE GROUNDED IN ACCORDANCE WITH NEC ARTICLE 250. THIS SHALL INCLUDE NEUTRAL CONDUCTORS, CONDUITS, SUPPORTS, CABINETS, BOXES, GROUND BUSES, ETC. THE NEUTRAL CONDUCTOR FOR EACH SYSTEM SHALL BE GROUNDED AT A SINGLE POINT.
2. PROVIDE GROUND CONDUCTOR IN RACEWAYS PER NEC.
3. PROVIDE BONDING AND GROUND TO MEET NFPA 780 – "LIGHTNING PROTECTION" AS A MINIMUM.
4. PROVIDE GROUNDING SYSTEM AS INDICATED ON THE DRAWINGS, AS REQUIRED BY THE NATIONAL ELECTRIC CODE, RADIO EQUIPMENT MANUFACTURERS, AND MOTOROLA R56 (AS APPLICABLE).

**ABBREVIATIONS AND LEGEND**

A	- AMPERE	PNLBD	- PANELBOARD
AFG	- ABOVE FINISHED GRADE	PVC	- RIGID NON-METALLIC CONDUIT
ATS	- AUTOMATIC TRANSFER SWITCH	RGS	- RIGID GALVANIZED STEEL CONDUIT
AWG	- AMERICAN WIRE GAUGE	SW	- SWITCH
BCW	- BARE COPPER WIRE	TGB	- TOWER GROUND BAR
BFG	- BELOW FINISHED GRADE	UL	- UNDERWRITERS LABORATORIES
BKR	- BREAKER	V	- VOLTAGE
C	- CONDUIT	W	- WATTS
CKT	- CIRCUIT	XFMR	- TRANSFORMER
DISC	- DISCONNECT	XMTR	- TRANSMITTER
EGR	- EXTERNAL GROUND RING		
EMT	- ELECTRIC METALLIC TUBING		
FSC	- FLEXIBLE STEEL CONDUIT		
GEN	- GENERATOR		
GPS	- GLOBAL POSITIONING SYSTEM		
GRD	- GROUND		
IGB	- ISOLATED GROUND BAR		
IGR	- INTERIOR GROUND RING (HALO)		
KW	- KILOWATTS		
NEC	- NATIONAL ELECTRIC CODE		
PCS	- PERSONAL COMMUNICATION SYSTEM		
PH	- PHASE		
PNL	- PANEL		

	E	UNDERGROUND ELECTRICAL CONDUIT
	T	UNDERGROUND TELEPHONE CONDUIT
		KILOWATT-HOUR METER
		UNDERGROUND BONDING AND GROUNDING CONDUCTOR.
	Ø	GROUND ROD
	●	CADWELD
	⊠	GROUND ROD WITH INSPECTION WELL

APPLICANT/LESSEE:



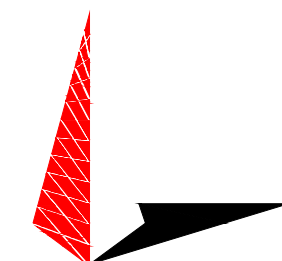
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

PLANS PREPARED BY:



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SEAL:



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REV	DATE	ISSUED FOR:

DRAWN BY: GLB      CHECKED BY: JKW

SHEET TITLE:






















**ELECTRICAL NOTES**

SHEET NUMBER: <b>E-1</b>	REVISION: <b>2</b> TEP #: 255888
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# ELECTRICAL LEGEND:

## ABBREVIATIONS:

A - AMPERE  
 AFG - ABOVE FINISHED GRADE  
 ATS - AUTOMATIC TRANSFER SWITCH  
 AWG - AMERICAN WIRE GAUGE  
 BCW - BARE COPPER WIRE  
 BFG - BELOW FINISHED GRADE  
 BKR - BREAKER  
 BTS - BASE TRANSCIEVER STATION  
 C - CONDUIT  
 C/W - COMPLETE WITH  
 CKT - CIRCUIT  
 DISC - DISCONNECT  
 EC - EMPTY CONDUIT  
 EGR - EXTERNAL GROUND RING  
 EMT - ELECTRIC METALLIC TUBING  
 F/A - FIRE ALARM  
 FSC - FLEXIBLE STEEL CONDUIT  
 GEN - GENERATOR  
 GPS - GLOBAL POSITIONING SYSTEM  
 GRD - GROUND  
 IGB - ISOLATED GROUND BAR  
 IGR - INTERIOR GROUND RING (HALO)  
 KW - KILOWATTS  
 MGB - MAIN GROUND BAR  
 CEC - CANADIAN ELECTRIC CODE  
 PCS - PERSONAL COMMUNICATION SYSTEM  
 PH - PHASE  
 PNL - PANEL  
 PNLBD - PANELBOARD  
 PVC - SCH40 RIGID NON-METALLIC CONDUIT  
 RBS - RADIO BASE STATION  
 REL - RELOCATED  
 RGS - RIGID GALVANIZED STEEL CONDUIT  
 S/C - SEPERATE CONDUIT  
 SES - SITE ENGINEERING SPECIFICATIONS  
 SW - SWITCH  
 TGB - TOWER GROUND BAR  
 U/F - UNFUSED  
 ULC - UNDERWRITERS LABORATORIES, CANADA  
 V - VOLTAGE  
 W - WATTS  
 WP - WEATHERPROOF  
 XFMR - TRANSFORMER  
 XMTR - TRANSMITTER

-----E----- UNDERGROUND ELECTRICAL CONDUIT  
 -----T----- UNDERGROUND TELEPHONE CONDUIT  
 KILOWATT-HOUR METER  
 ----- UNDERGROUND BONDING AND GROUNDING CONDUCTOR  
 CADWELD  
 GROUND ROD WITH INSPECTION WELL  
 EXISTING M/W DISH ANTENNA  
 FUTURE M/W DISH ANTENNA  
 EXISTING ROOF DRAIN  
 EXISTING ROOF HATCH  
 15A 120V SPST SWITCH  
 15A 120V DUPLEX RECEPTACLE  
 120V. 1Ø DIRECT CONNECTION TO EQUIPMENT SUPPLIED BY OTHER DIVISIONS  
 208V. 1Ø DIRECT CONNECTION TO EQUIPMENT SUPPLIED BY OTHER DIVISIONS  
 CIRCUIT BREAKER  
 DISCONNECT SWITCH. F DENOTES FUSED  
 SURFACE MOUNTED PANELBOARD  
 TRANSFORMER  
 CHECK METER  
 DENOTES CABLE OR CONDUIT TURNING UP IN PLAN VIEW  
 CHANGE IN ELEVATION OF CABLE OR CONDUIT IN PLAN VIEW  
 DENOTES CABLE OR CONDUIT TURNING DOWN IN PLAN VIEW  
 GROUND ROD  
 LIGHTNING PROTECTION AIR TERMINAL  
 --EC-- ETHERNET CABLE  
 --F-- FIBRE CABLE  
 --DC-- DC CABLE

APPLICANT/LESSEE:



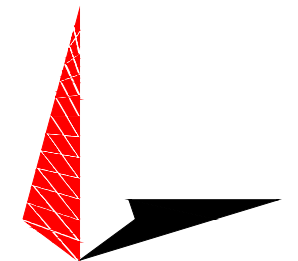
8051 CONGRESS AVENUE  
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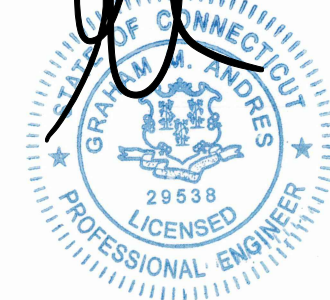
PLANS PREPARED BY:



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DRAWN BY: GLB CHECKED BY: JKW

SHEET TITLE:

**ELECTRICAL  
LEGEND**

SHEET NUMBER:

**E-2**

REVISION:

**2**

TEP #: 255888

# ELECTRICAL LEGEND

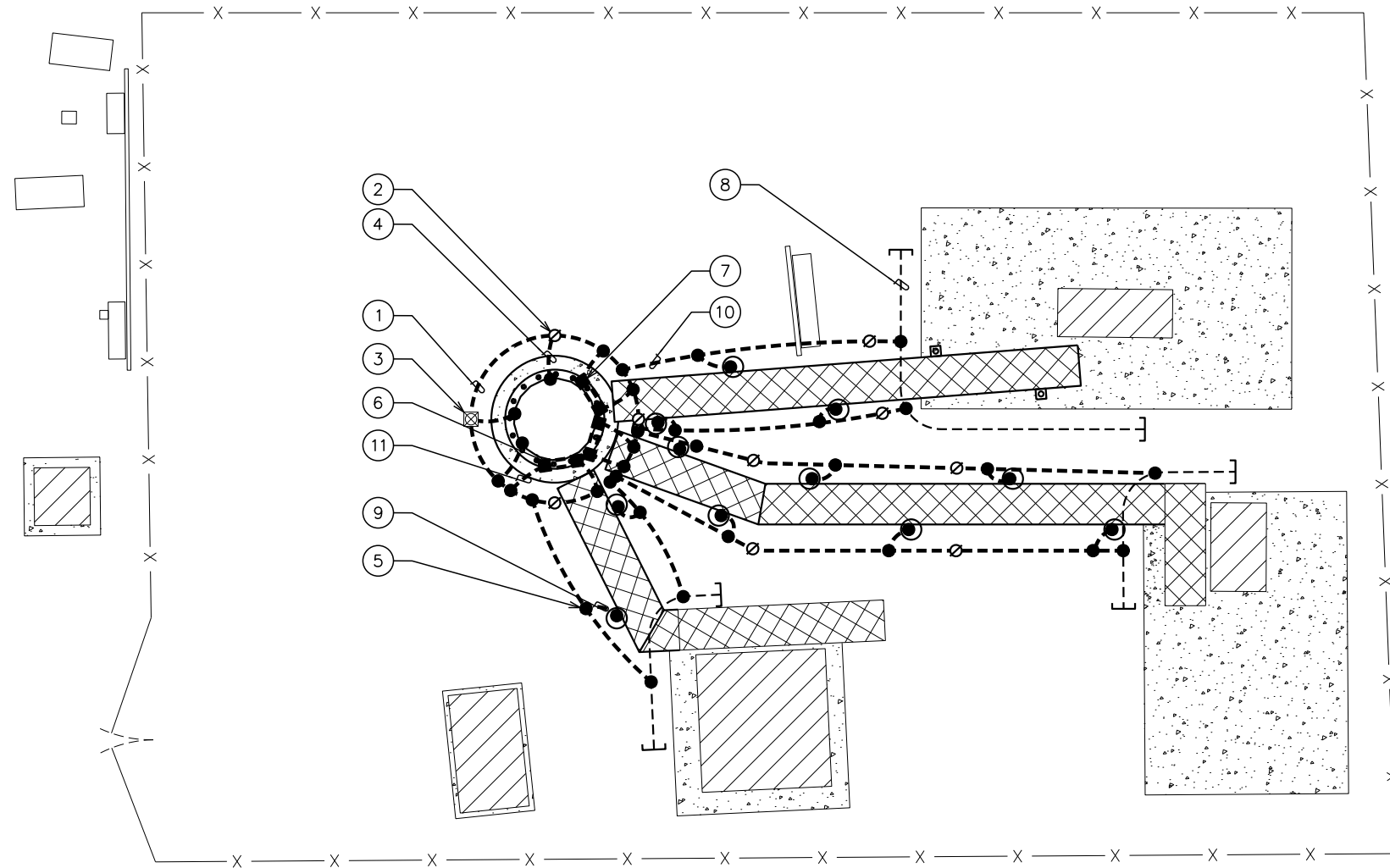
SCALE: N.T.S.

**GROUNDING NOTES:**

- GROUNDING ELECTRODES SHALL BE CONNECTED IN A RING USING #2 AWG BARE TINNED COPPER WIRE. THE TOP OF THE GROUND RODS AND THE RING CONDUCTOR SHALL BE 30" BELOW FINISHED GRADE. GROUNDING ELECTRODES SHALL BE DRIVEN ON 15'-0" CENTERS (MAX).
- BONDING OF THE GROUNDED CONDUCTOR (NEUTRAL) AND THE GROUNDING CONDUCTOR SHALL BE AT THE SERVICE DISCONNECTING MEANS. BONDING JUMPER SHALL BE INSTALLED PER N.E.C. ARTICLE 250.30.
- CONTRACTOR SHALL NOTIFY THE CONSTRUCTION MANAGER WHEN THE GROUNDING SYSTEM IS COMPLETE. THE CONSTRUCTION MANAGER SHALL INSPECT THE GROUNDING SYSTEM PRIOR TO BACKFILLING.
- CONTRACTOR SHALL VERIFY EXISTENCE AND LOCATION OF EXISTING SHELTER GROUND RINGS, FENCE GROUNDING AND GATEPOST GROUNDING.

**DRAWING NOTES:**

- PROPOSED TOWER GROUND RING
- PROPOSED GROUND ROD (TYP)
- PROPOSED GROUND ROD WITH INSPECTION WELL
- #2 GROUND LEAD FROM TOWER TO TOWER GROUND RING (TYP)
- PROPOSED CADWELD (TYP)
- PROPOSED TOWER GROUND BAR (TYP)
- PROPOSED 2-HOLE MECHANICAL LUG CONNECTION (TYP)
- EXISTING EQUIPMENT GROUND RING (TYP). CONTRACTOR TO VERIFY LOCATION AND EXISTENCE, AND REPLACE IF MISSING.
- #2 ICE BRIDGE POST GROUND LEAD (TYP)
- #2 GROUND LEAD FROM EXISTING GROUND RING TO PROPOSED GROUND RING (TYP OF 2)
- #2 GROUND LEAD FROM GROUND BAR TO TOWER GROUND RING (TYP)



APPLICANT/LESSEE:



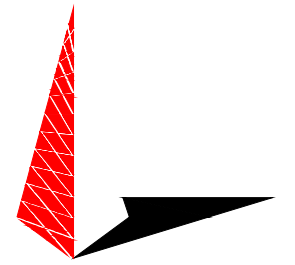
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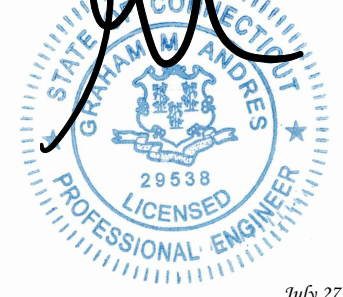
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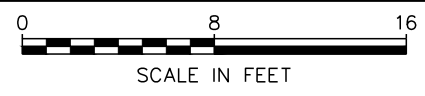
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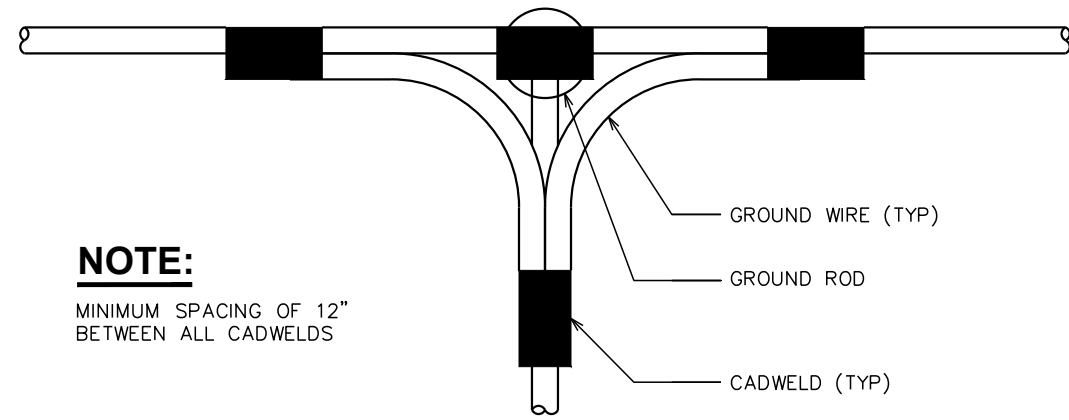
SHEET TITLE:  
**GROUNDING PLAN**

SHEET NUMBER: **E-3** | REVISION: **2**  
TEP #: 255888

**GROUNDING PLAN**

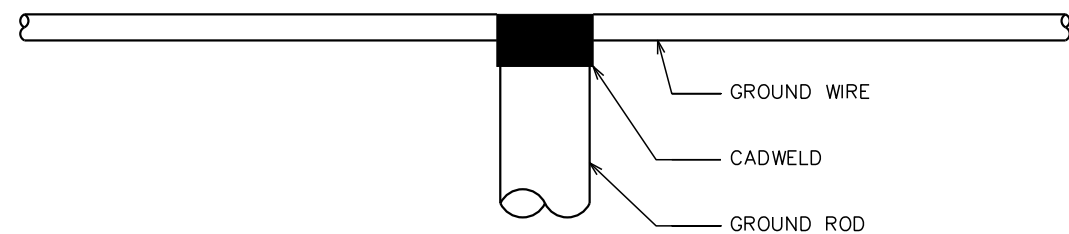
SCALE: 1/8" = 1'-0"





**NOTE:**  
MINIMUM SPACING OF 12"  
BETWEEN ALL CADWELDS

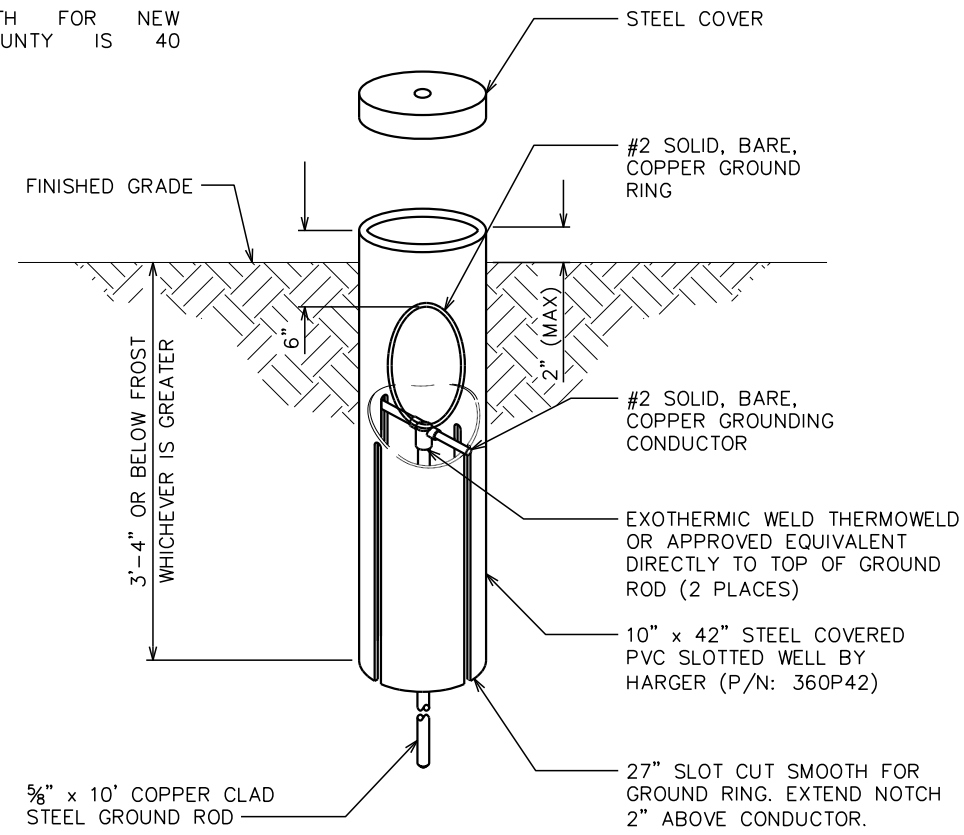
**TOP VIEW**



**SIDE VIEW**

**NOTE:**

FROST DEPTH FOR NEW  
LONDON COUNTY IS 40  
INCHES.



**GROUND ROD WITH INSPECTION WELL DETAIL**

SCALE: N.T.S.

APPLICANT/LESSEE:



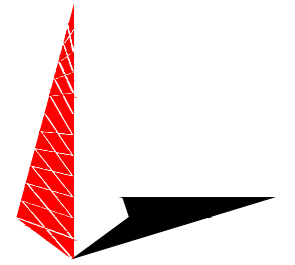
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

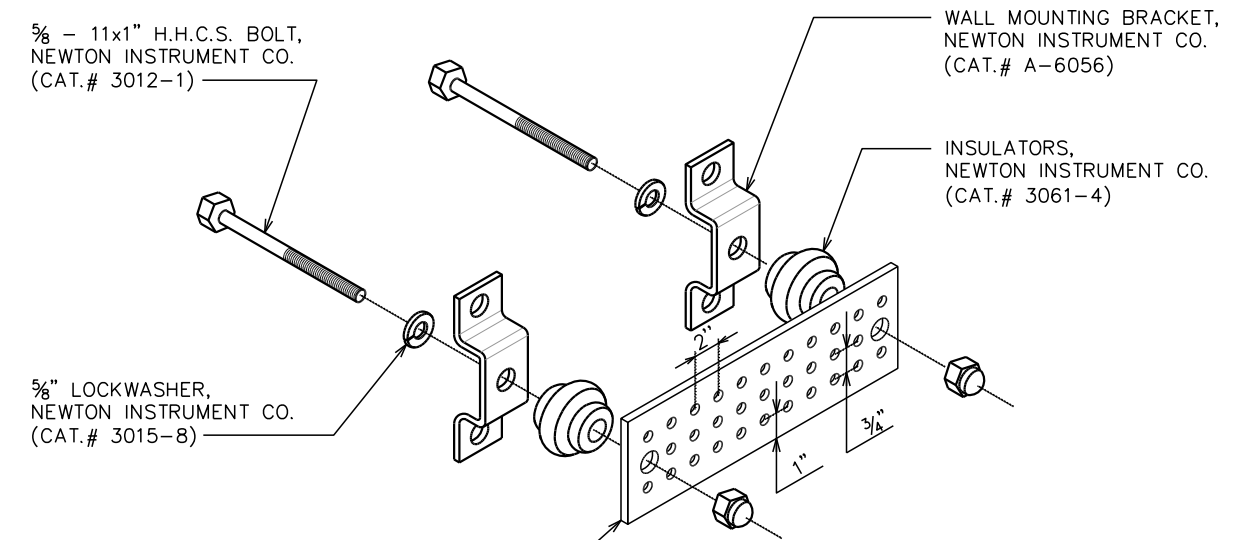
PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**  
326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

**CADWELD GROUNDING DETAIL**

SCALE: N.T.S.



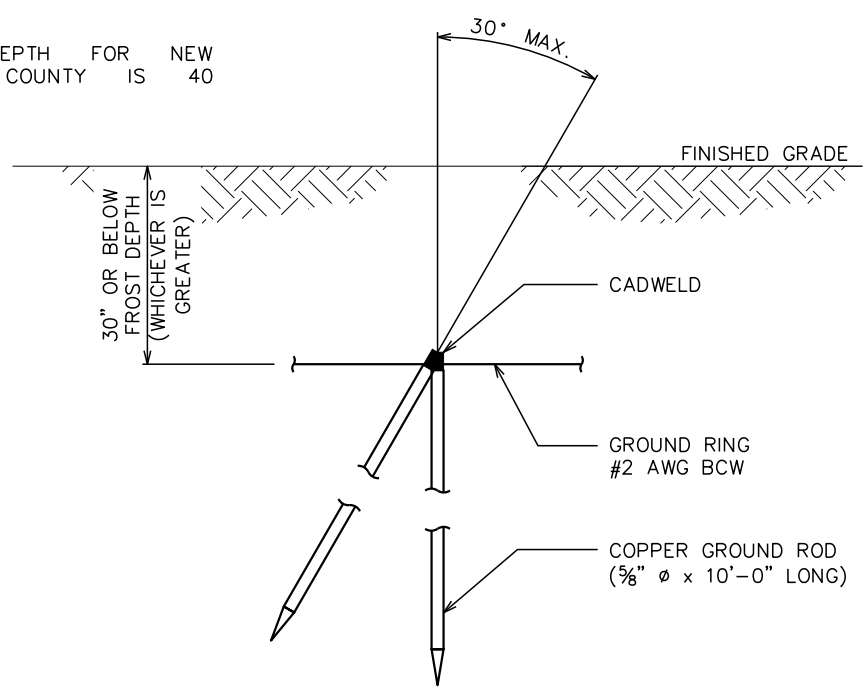
**NOTE:**  
GROUND BAR SHALL BE SIZED TO  
ACCOMMODATE ALL GROUNDING CONNECTIONS  
REQUIRED PLUS PROVIDE 50% SPARE CAPACITY

**STANDARD GROUND BAR DETAIL**

SCALE: N.T.S.

**NOTE:**

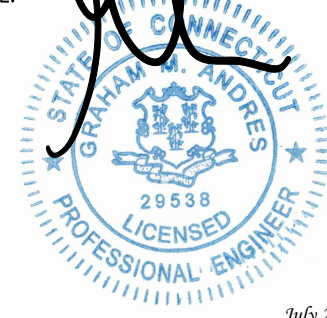
FROST DEPTH FOR NEW  
LONDON COUNTY IS 40  
INCHES.



**COPPER-CLAD STEEL GROUND ROD DETAIL**

SCALE: N.T.S.

SEAL:



REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB CHECKED BY: JKW

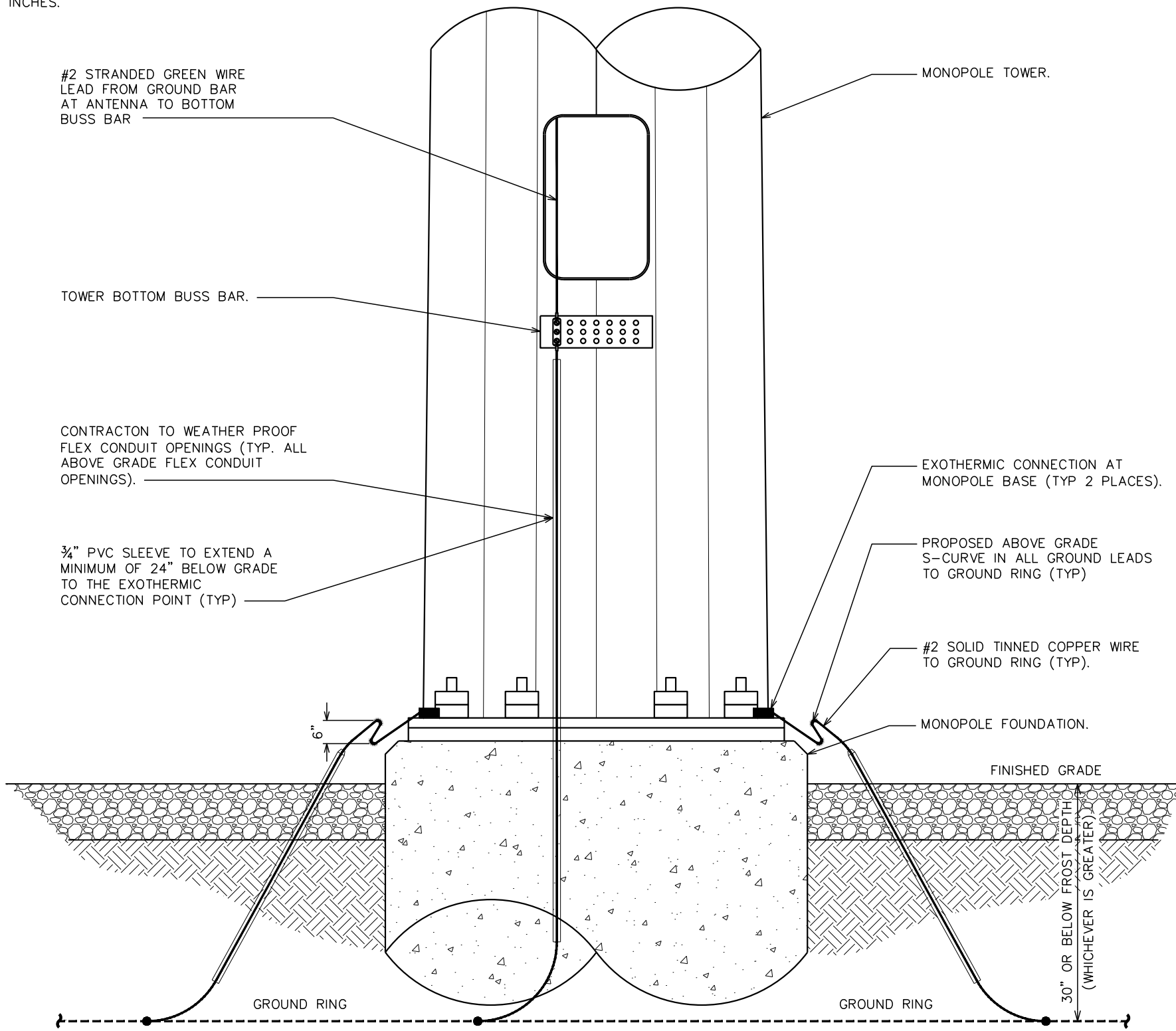
SHEET TITLE:  
**GROUNDING  
DETAILS I**

SHEET NUMBER:  
**E-4**

REVISION:  
**2**  
TEP #: 255888

**NOTE:**

FROST DEPTH FOR NEW  
LONDON COUNTY IS 40  
INCHES.

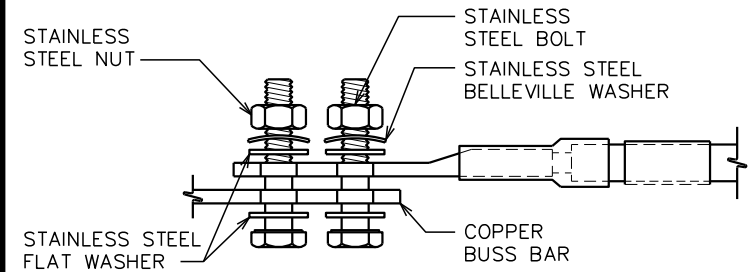


**TOWER GROUNDING DETAIL**

SCALE: N.T.S.

**NOTES:**

1. ALL HARDWARE SHALL BE 18-8 STAINLESS STEEL, INCLUDING THE BELLEVILLE WASHERS. COAT ALL SURFACES WITH KOPR-SHIELD BEFORE MATING.
2. FOR GROUND BOND TO STEEL ONLY: INSERT A DRAGON TOOTH WASHER BETWEEN THE LUG AND STEEL. COAT ALL SURFACES WITH KOPR-SHIELD.



**LUG DETAILS**

SCALE: N.T.S.

APPLICANT/LESSEE:



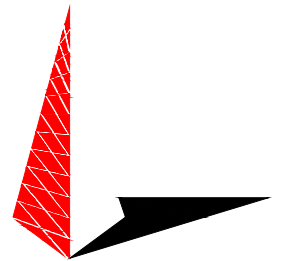
8051 CONGRESS AVENUE  
BOCA RATON, FL 33487-1307  
OFFICE: (561) 226-9457

PROJECT INFORMATION:

**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**

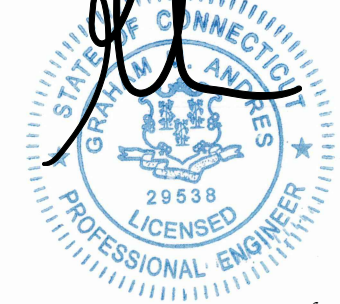
130 WELLES ROAD  
GROTON, CT 06340  
(NEW LONDON COUNTY)

PLANS PREPARED BY:



**TOWER ENGINEERING PROFESSIONALS**  
326 TRYON ROAD  
RALEIGH, NC 27603-3530  
OFFICE: (919) 661-6351  
www.tepgroup.net

SEAL:



July 27, 2021

REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB | CHECKED BY: JKW

SHEET TITLE:

**GROUNDING  
DETAILS II**

SHEET NUMBER: | REVISION:

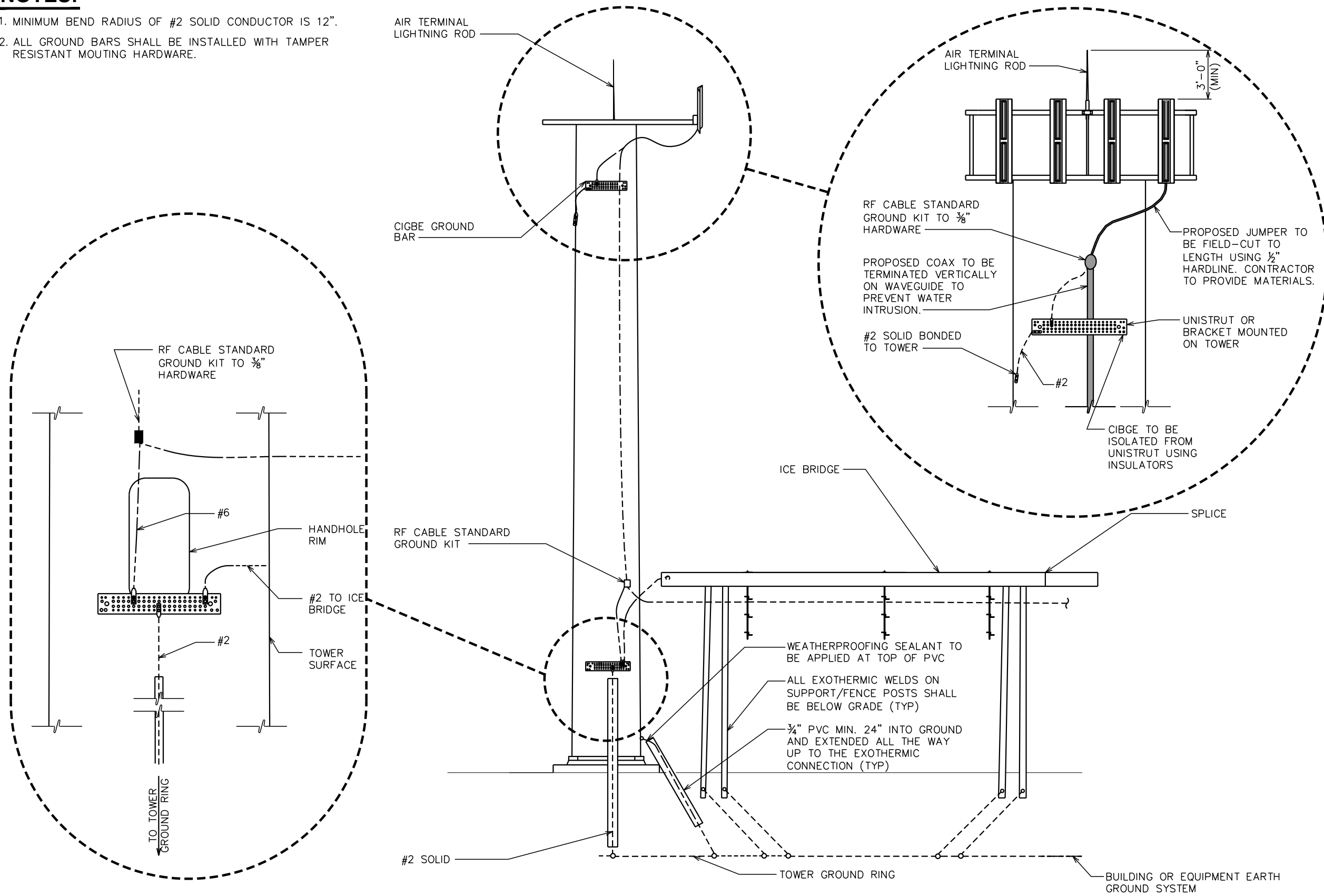
**E-5**

**2**

TEP #: 255888

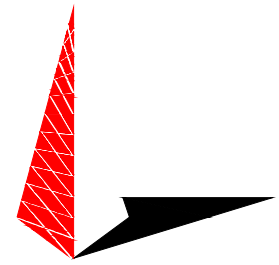
**NOTES:**


1. MINIMUM BEND RADIUS OF #2 SOLID CONDUCTOR IS 12".
2. ALL GROUND BARS SHALL BE INSTALLED WITH TAMPER RESISTANT MOUNTING HARDWARE.



APPLICANT/LESSEE:  
  
 8051 CONGRESS AVENUE  
 BOCA RATON, FL 33487-1307  
 OFFICE: (561) 226-9457

PROJECT INFORMATION:  
**SITE NAME: SOUTH LEDYARD**  
**SITE ID: CT46142A**  
 130 WELLES ROAD  
 GROTON, CT 06340  
 (NEW LONDON COUNTY)

PLANS PREPARED BY:  
  
**TOWER ENGINEERING PROFESSIONALS**  
 326 TRYON ROAD  
 RALEIGH, NC 27603-3530  
 OFFICE: (919) 661-6351  
 www.tep-group.net

SEAL:  
  
 July 27, 2021

REV	DATE	ISSUED FOR:
2	07-27-21	CONSTRUCTION
1	07-16-21	PRELIMINARY
0	11-24-20	PRELIMINARY

DRAWN BY: GLB | CHECKED BY: JKW

SHEET TITLE:  
**SBA GROUNDING  
 DETAILS III**

SHEET NUMBER:  
**E-6**

REVISION:  
**2**  
 TEP #: 255888

**ICE BRIDGE, COAX, STANCHION, AND TOWER GROUNDING DETAIL**

SCALE: N.T.S.

8051 Congress Ave  
Boca Raton, FL 33487

T + 561.995.7670  
F + 561.995.7626

sbsite.com



## NPA - Collocation Compliance Statement

**Site Name/#:** South Ledyard- Town Dump / CT46142-A @ 130 Welles Road, Groton, CT 06340,  
**Structure#** 2

To Whom It May Concern:

In order to facilitate the collocation process for the above referenced site(s), SBA 2012 TC Assets, LLC ("Owner") hereby makes the following representations, that to the best of its knowledge:

The tower is a structure built for the sole or primary purpose of supporting FCC-licensed antennas and their associated facilities.

Tower construction was completed **after** March 16, 2001.

The Section 106 review process for the tower set forth in 36 CFR Part 800 and any associated environmental reviews required by the FCC have been completed.

The above referenced tower has **not** been determined by the FCC to have an effect on one or more historic properties, unless such effect has been found to be not adverse through a no adverse effect finding, or if found to be adverse or potentially adverse, has been resolved, such as through a conditional no adverse effect determination, a Memorandum of Agreement, a programmatic agreement, or otherwise in compliance with Section 106 and Subpart B of 36 CFR 800; or

The tower is **not** the subject of a pending environmental review or related proceeding before the FCC involving compliance with Section 106 of the National Historic Preservation Act; or

Owner has **not** received written or electronic notification that the FCC is in receipt of a complaint from a member of the public, a SHPO, or the Advisory Council on Historic Preservation, that the collocation has an adverse effect on one or more historic properties.

Sincerely,

By: 

Name: Angie Becella

Title: Compliance Specialist





TEP-TCNS inbox &lt;tcns@tepgroup.net&gt;

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**Section 106 Notification of FCC Initiation of Review- Email ID #5766821**1 message

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**towernotifyinfo@fcc.gov** <towernotifyinfo@fcc.gov>

Mon, Apr 26, 2021 at 8:15 AM

To: tcns@tepgroup.net

This is to notify you that the FCC has initiated review of the following filing:  
Date of Action: 04/26/2021

File Number: 0009346951

TCNS Number: 223176

Purpose: New Tower Submission Packet

Notification Date: 7AM EST 12/30/2020

Applicant: SBA Towers V, LLC

Consultant: Tower Engineering Professionals, Inc.

Positive Train Control Filing Subject to Expedited Treatment Under Program Comment: No

Site Name: South Ledyard CT46142A

Site Address: 130 Welles Road

Detailed Description of Project: Proposed monopole communications tower.

Site Coordinates: 41-23-34.2 N, 71-58-12.0 W

City: Groton

County: NEW LONDON

State:CT

Lead SHPO/THPO: Connecticut Historical Commission (TCNS SHPO)

The Federal Communications Commission (FCC) has received your Submission Packet for the referenced tower construction project. You provided this documentation as part of the process to comply with Section 106 of the National Historic Preservation Act and the implementing regulations of the Advisory Council on Historic Preservation (ACHP); Protection of Historic Properties (36 CFR Part 800). That formal process has been streamlined by the Nationwide Programmatic Agreement for Review of Effects on Historic Properties for Certain Undertakings Approved by the Federal Communications Commission (NPA).

**NOTICE OF FRAUDULENT USE OF SYSTEM, ABUSE OF PASSWORD AND RELATED MISUSE**

Use of the Section 106 system is intended to facilitate consultation under Section 106 of the National Historic Preservation Act and may contain information that is confidential, privileged or otherwise protected from disclosure under applicable laws. Any person having access to Section 106 information shall use it only for its intended purpose. Appropriate action will be taken with respect to any misuse of the system.



Ryan Malek &lt;rmalek@tepgroup.net&gt;

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**No SHPO response, 30 days expired, No Adverse Effect Determination, E106 File # 0009346951, TCNS# 223176**

1 message

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**Ryan Malek** <rmalek@tepgroup.net>

Thu, Apr 22, 2021 at 10:53 AM

To: Amanda Murphy &lt;Amanda.Murphy@fcc.gov&gt;, Jill Springer &lt;jill.springer@fcc.gov&gt;

Cc: Nikki Mauro &lt;nmauro@tepgroup.net&gt;, Garrett Johnson &lt;gjohnson@tepgroup.net&gt;

Good morning Amanda and Jill,

Here is a brief synopsis of the timeline for this project, E106 File # 0009346951, TCNS# 223176.

- 1) TEP Emailed FCC Form 620 to CT SHPO on 12/29/2020 - "no adverse effect" determination for historic properties in visual APE. No historic properties affected in direct APE.
- 2) CT SHPO responded on 1/27/21 requesting additional photographs and simulations (email attached in E106 Documents)
- 3) TEP provided the additional information to SHPO on 2/25/21
- 4) TEP followed up with CT SHPO via email on 4/1/21 and 4/19/21 (no response). TEP called CT SHPO on 4/21/2021 (no response).

Native American tribal consultation is complete. No additional comments from the public or potential consulting parties were received.

Please see attached PDF of the email correspondence and let me know if you would like me to attach a copy of the complete Submission Form 620 that is also accessible via the E106 filing.

Therefore, we are notifying the Commission that CT SHPO has not provided written notice that they agree or disagree with the determination of "no adverse effect" on historic properties within 30 days of receipt of a complete Submission Packet. If we do not receive a response from the FCC within 15 days, we will proceed under the assumption that the Section 106 process is complete.

Thank you!  
Best regards,

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\_\_\_\_\_  
Ryan A. Malek

**Environmental Division Manager | Tower Engineering Professionals, Inc.** ([www.tepgroup.net](http://www.tepgroup.net))

326 Tryon Road|Raleigh, NC 27603-3530|Office: (919) 661-6351 Ext. 5325|Fax: (919) 661-6350|Mobile: (919) 332-1917

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**South Ledyard\_TCNS#223176\_Email Chain.pdf**  
275K