



CITY OF SOMERVILLE

Commonwealth of Massachusetts

93 Highland Avenue

Somerville, MA 02143

(617) 625-6600

BUSINESS LICENSE APPLICATION - Small Wireless Facility

File #: 19-014850

License #: BL19-000096

Address: 107 PERKINS ST

Licensee: Matthew Pricco Network Building + Consulting

DBA Name: ExteNet Systems, Inc.

Business Ownership Type: Corporation

Legal Name of Entity: ExteNet Systems, Inc.

Owners/Officers: James A. Hyde, H. Anthony Lehy, Daniel L. Timm,

License Information:

Do you believe this to be a 6409(a) application?: No

Describe the reason for the work, and the intended beneficiaries: Installation of a small cell wireless facility on a wood utility pole in the public right-of-way. The facility will improve wireless communications services for residents, businesses, and visitors in the vicinity.

Provide the detailed description of the work that should appear on the License: Extenet proposes to install a small cell wireless facility on an existing wood utility pole. The principal elements of the proposed facility are an antenna housed in a 24 inch long shroud side-mounted on the pole, including an additional 6 feet of base mounting equipment and three radios in a shroud also mounted on the pole.

of installations on existing poles: 1

of installations on new poles: 0

Provide the legal name of the entity that will own the License: ExteNet Systems, Inc.

Approval Conditions: **Contractor shall take all necessary precautions to avoid damaging any tree or tree part with equipment. All nearby street tree(s) shall be protected prior to and during all construction activities using TREE BOX or TREE WRAPS. This includes the tree at 107 Perkins St. TREE BOX shall be constructed from 2 in. x 4 in. lumber creating a box around the border of the tree pit with 2 in. x 4 in. lumber standing straight up at the corners and wrapped with orange snow fence. TREE WRAPS (TREE TRUNK WRAPPING PROTECTION LUMBER) shall consist of 2 in. x 4 in. and 8 ft. height lumber wired together in close spacing with zip ties or 16 gauge galvanized steel wire to form a protective enclosure around tree trunks. Use burlap to separate the wood from the bark if necessary**

to prevent wood from scraping or bruising bark. Do not use staples or puncture the trunk in any way.

Approved By:

John Power, Approved

Karla Cuarezma, Approved

Malik Drayton, Approved with Conditions

APPROVAL CONDITION: MD20200205: Contractor shall take all necessary precautions to avoid damaging any tree or tree part with equipment.

APPROVAL CONDITION: MD20200205: All nearby street tree(s) shall be protected prior to and during all construction activities using TREE BOX or TREE WRAPS. This includes the tree at 107 Perkins St. . TREE BOX shall be constructed from 2 in. x 4 in. lumber creating a box around the border of the tree pit with 2 in. x 4 in. lumber standing straight up at the corners and wrapped with orange snow fence. Detail attached. . TREE WRAPS (TREE TRUNK WRAPPING PROTECTION LUMBER) shall consist of 2 in. x 4 in. and 8 ft. height lumber wired together in close spacing with zip ties or 16 gauge galvanized steel wire to form a protective enclosure around tree trunks. Use burlap to separate the wood from the bark if necessary to prevent wood from scraping or bruising bark. Do not use staples or puncture the trunk in any way.

Peter Lew, Approved

Mark Lawhorne, Approved

John J. Long, Approved



NE-MA-BSTN3N01-TMO

NE-MA-BSTN3N01-03342 / NE3211BA_21LAB

PROPOSED SMALL CELL NODE

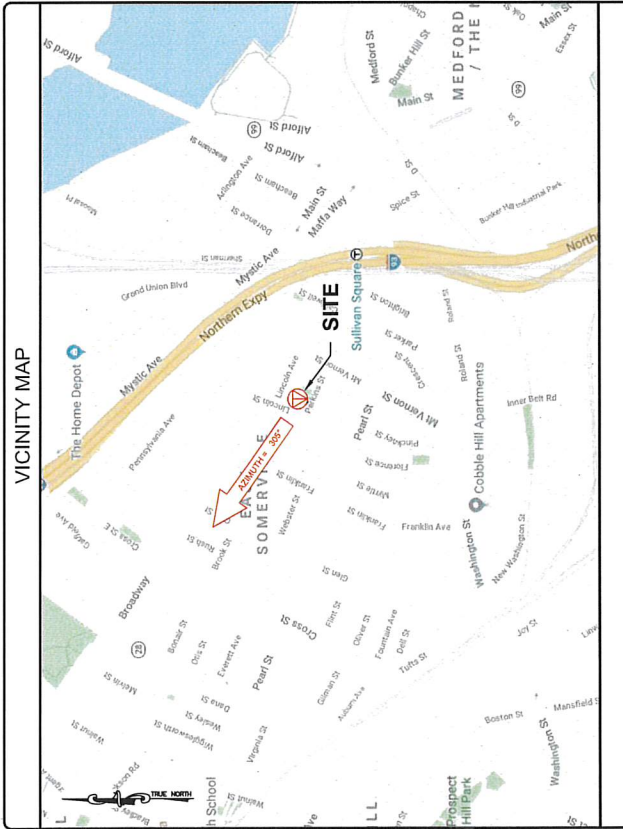
107 PERKINS STREET, SOMERVILLE, MA 02145
CITY OF SOMERVILLE, MIDDLESEX COUNTY

LATITUDE: 42.385096°
LONGITUDE: -71.080976°

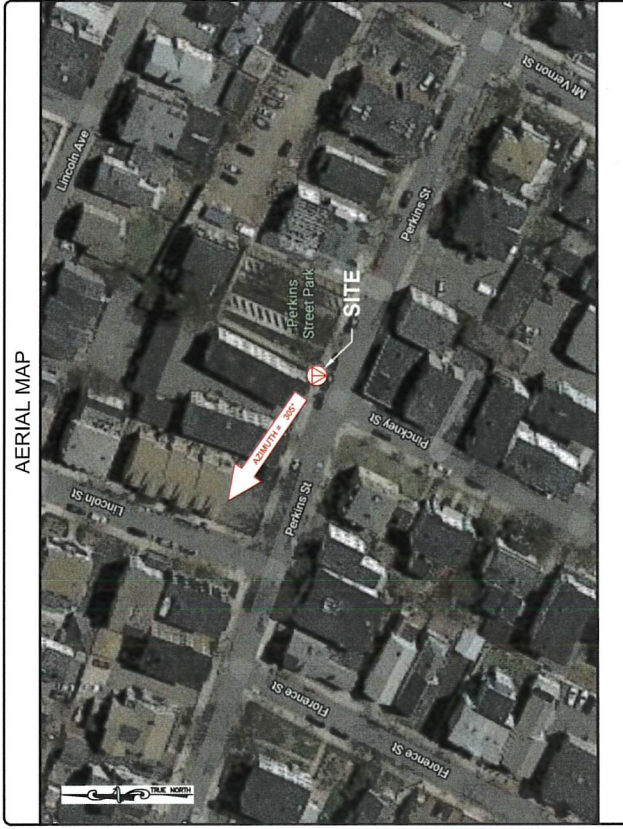


Know what's below.
Call before you dig.

VICINITY MAP



AERIAL MAP



PROJECT INFORMATION

PROJECT NAME: NE-MA-BSTN3N01-TMO
POLE TAG: 278/17
LATITUDE: 42.385096°
LONGITUDE: -71.080976°
JURISDICTION: CITY OF SOMERVILLE
MIDDLESEX COUNTY
EXTENET PROJECT MANAGER: RICK ANSELINI
USLE # 06052
NOC: (866) 882-5327
HUB LOCATION: HUB: MEDFORD STREET
SOMERVILLE, MA 02145
ELECTRIC COMPANY: EVERSOURCE

CODE COMPLIANCE

ALL WORK AND MATERIALS SHALL BE PERFORMED AND INSTALLED IN ACCORDANCE WITH THE CURRENT EDITIONS OF THE FOLLOWING CODES AS ADOPTED BY THE LOCAL GOVERNING AUTHORITIES. NOTHING IN THESE PLANS IS TO BE CONSTRUED TO PERMIT WORK NOT CONFORMING TO THE LATEST EDITIONS OF THE FOLLOWING CODES.

- 2015 INTERNATIONAL BUILDING CODE
- 2015 INTERNATIONAL ELECTRICAL CODE (AMENDED 01/1 EDITION)
- 2017 NATIONAL ELECTRICAL CODE
- NFPA 1-2015 EDITION
- 2015 IFC - REFERENCE S27 CHR
- AMERICAN CONCRETE INSTITUTE
- AMERICAN INSTITUTE OF STEEL CONSTRUCTION
- MANUAL OF STEEL CONSTRUCTION 13TH EDITION
- AS/NZS 1752-222-G
- TIA 807
- INSTITUTE FOR ELECTRICAL & ELECTRONICS ENGINEER 81
- IEEE C2 NATIONAL ELECTRIC SAFETY CODE LATEST EDITION
- TELECORDIA GR-1275
- ANSI/JT 311

DRAWING INDEX

01	TITLE SHEET
02	NOTES
03	ELEVATION
04	ANTENNA & EQUIPMENT DETAILS
05	ELECTRICAL & GROUNDING DETAILS

ENGINEER

KRIPAKARAN KOLANDAVELU, P.E.
MA PROFESSIONAL ENGINEER # 50019



PROFESSIONAL STAMP

DESIGN RECORD

REV	DATE	DESCRIPTION	BY
0	04/11/19	PRELIMINARY	NBS
1	05/15/19	POC REVIEWED	COE
2	03/01/19	STAMP ADDED	NBS
3	03/20/19	REVISED	NBS
4	01/20/20	MOQAT REVISION	DRG

SITE INFORMATION

NE-MA-BSTN3N01-03342
TMO ID: NE3211BA_21LAB
107 PERKINS STREET
SOMERVILLE, MA 02145
MIDDLESEX COUNTY

APPLICANT

extenet
YOUR NETWORK. EVERYWHERE.
SYSTEMS
3030 WASHINGTON AVENUE, SUITE 340
LITTLE ROCK, AR 72202
(501) 905-3060

ENGINEERING FIRM

NBS+C
TOTALLY COMMITTED.
NBS+C ENGINEERING SERVICES, LLC.
100 WASHINGTON STREET
SOMERVILLE, MA 02145
(617) 882-5327

TITLE SHEET

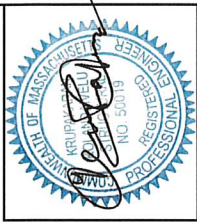
SHEET NUMBER
01 OF 05



NE-MA-BSTN3N01-03342
 TWO RD. NES211BA, Z1LAB
 107 PERKINS STREET
 SOMERVILLE, MA 02145
 MIDDLESEX COUNTY

REVISIONS

REV	DATE	DESCRIPTION	BY
4	01/20/20	MOUNT REVISION	DRG
3	09/23/19	REVISION	NBS
2	08/06/19	STAMP REVISION	CHE
1	05/19/19	POC REVISION	NBS
0	04/11/19	PRELIMINARY	ALM



KRIPAKARAN KOLANDAVELU, P.E.
 MA PROFESSIONAL ENGINEER LIC. # 50019

ELEVATION

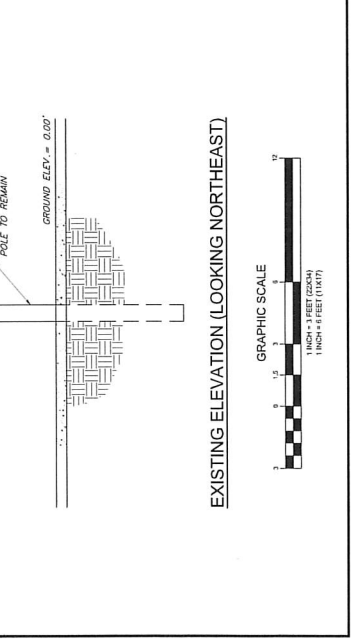
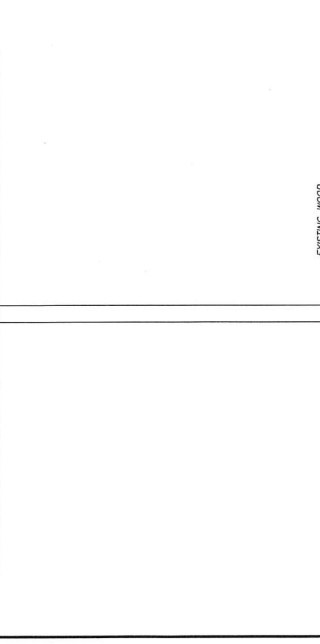
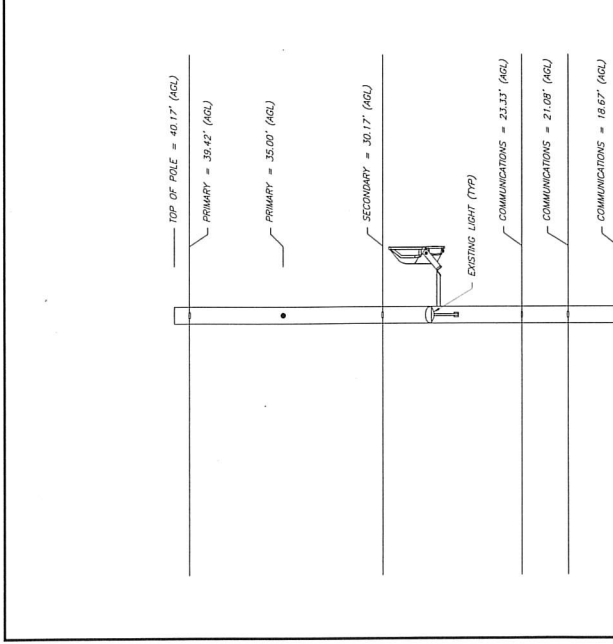
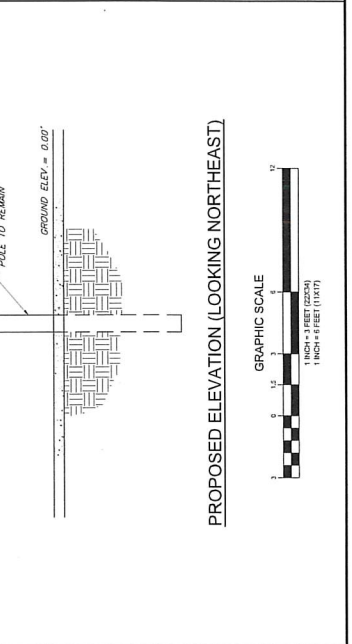
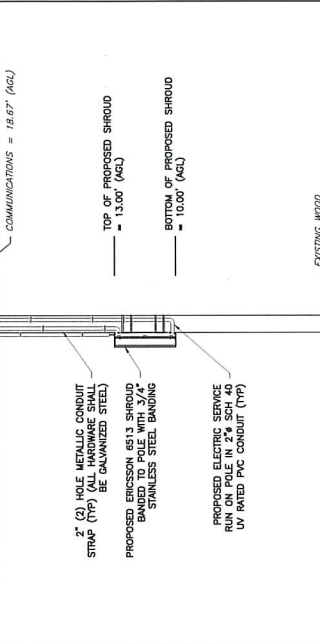
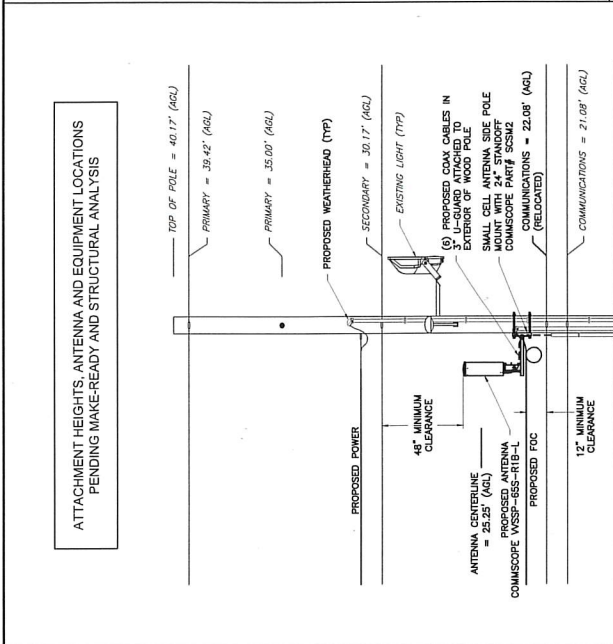
SHEET NUMBER
03 OF 05



EXISTING CONDITIONS

NOTES:

- EQUIPMENT ELEVATION IS SUBJECT TO MAKE READY PERFORMED BY POLE OWNER.
- NEW PLACED SHALL BE ASVA COMPLIANT AND DISPLAY THE FOLLOWING INFORMATION: TRANSMITTING SYSTEM, EQUIPMENT OWNER & PROPER CONTACT INFORMATION. INSTALL PER UTILITY COMPANY REQUIREMENTS AND VERIFY EXACT MOUNTING HEIGHT IN FIELD.
- MAINTAIN MINIMUM OF 8'-6" FROM GROUND LEVEL TO BOTTOM OF PROPOSED SHROUD.
- MAINTAIN MINIMUM OF 42" FROM TOP COMMUNICATION ATTACHMENT TO BOTTOM SECONDARY POWER ATTACHMENT.
- MAINTAIN MINIMUM OF 48" CLEARANCE IN ANY DIRECTION FROM ANTENNA AND MOUNTING BRACKET TO NEAREST SECONDARY POWER CONNECTION.
- MAINTAIN MINIMUM OF 12" FROM TOP COMMUNICATIONS LINE TO ANY ADDITIONAL COMMUNICATIONS LINE.
- MAINTAIN MINIMUM OF 5' FROM GROUND LEVEL TO METER LOCATION.
- MAINTAIN MINIMUM OF 6" CLEARANCE IN ANY DIRECTION FROM ANTENNA AND MOUNTING BRACKET TO NEAREST PRIMARY POWER CONNECTION.
- EQUIPMENT TO BE INSTALLED ON OPPOSITE SIDE OF TRAFFIC FLOW.
- POWER SUPPLY & WEATHERHEAD SHOULD BE INSTALLED ON THE SAME SIDE OF THE POLE WITH THE SECONDARY(S) AND COMMUNICATION CABLE(S) TO ACCOMMODATE CLIMBING OF THE POLE.



REVISIONS

REV	DATE	DESCRIPTION	BY
4	01/20/20	MOUNT REVISED	DRG
3	09/23/19	REVISED	MSB
2	09/09/19	STAMP ADDED	DRG
1	05/15/19	POC REVISED	MSB
0	04/11/19	PRELIMINARY	ALM



ENGINEER
KRUPAKARAN KOUNDAVELU P.E.
MA PROFESSIONAL ENGINEER LIC. # 30019

SHEET TITLE
ANTENNA & EQUIPMENT DETAILS

SHEET NUMBER
04 OF 05

ENGINEERING FIRM

APPLICANT

SITE INFORMATION

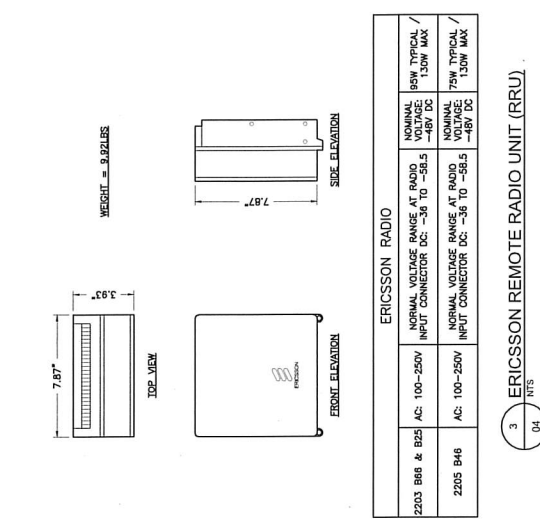
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PROFESSIONAL STAMP

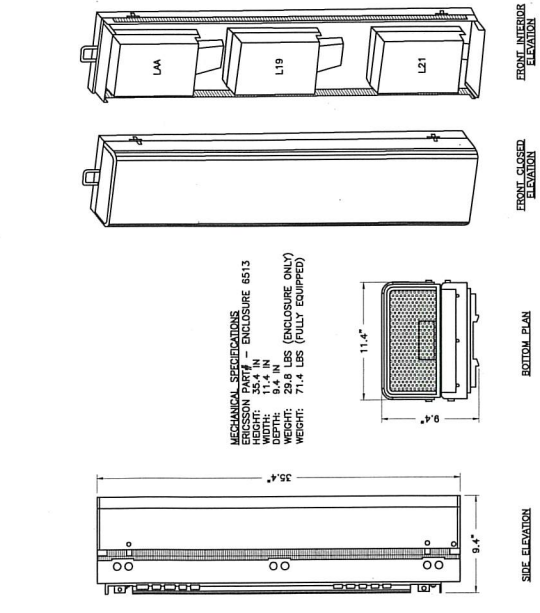
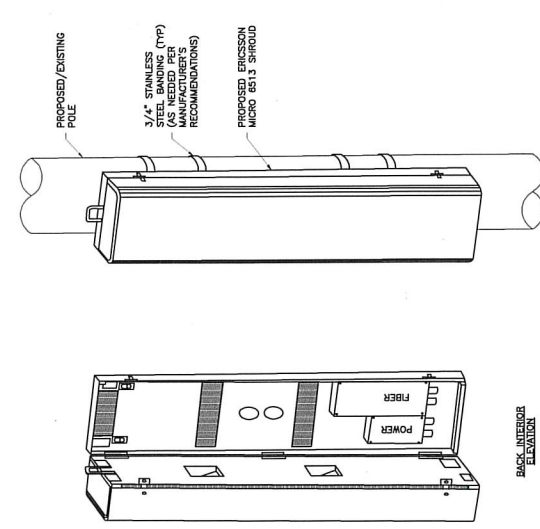
ENGINEER

SHEET TITLE

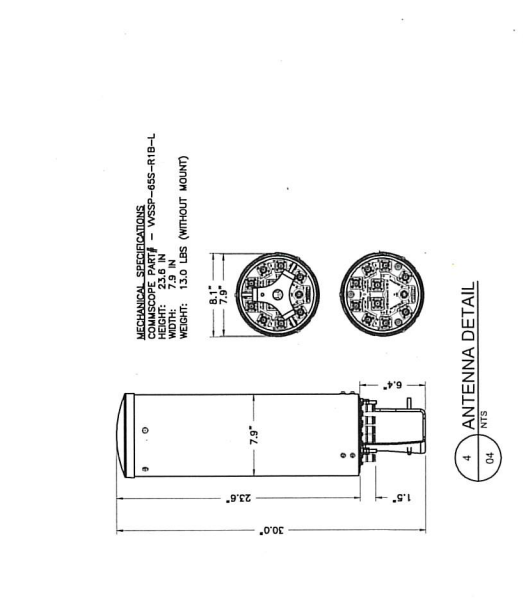
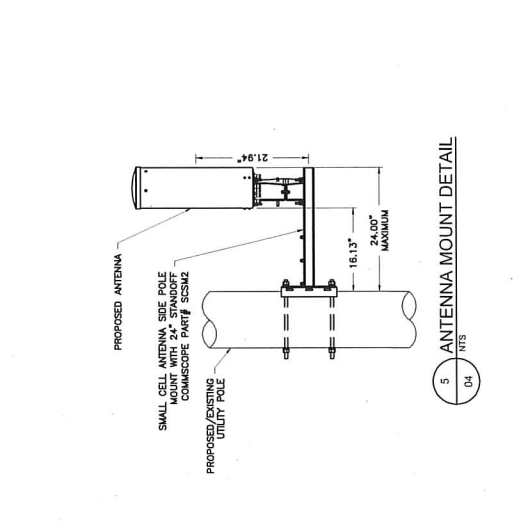
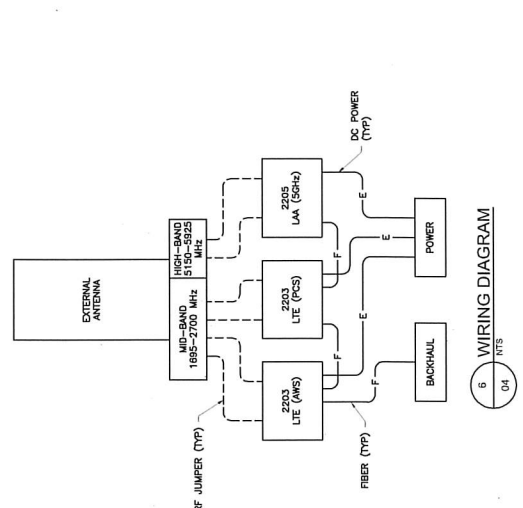
SHEET NUMBER



3 ERICSSON REMOTE RADIO UNIT (RRU)

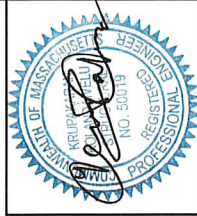


1 ERICSSON MICRO 6513 SHROUD DETAIL



4 ANTENNA DETAIL

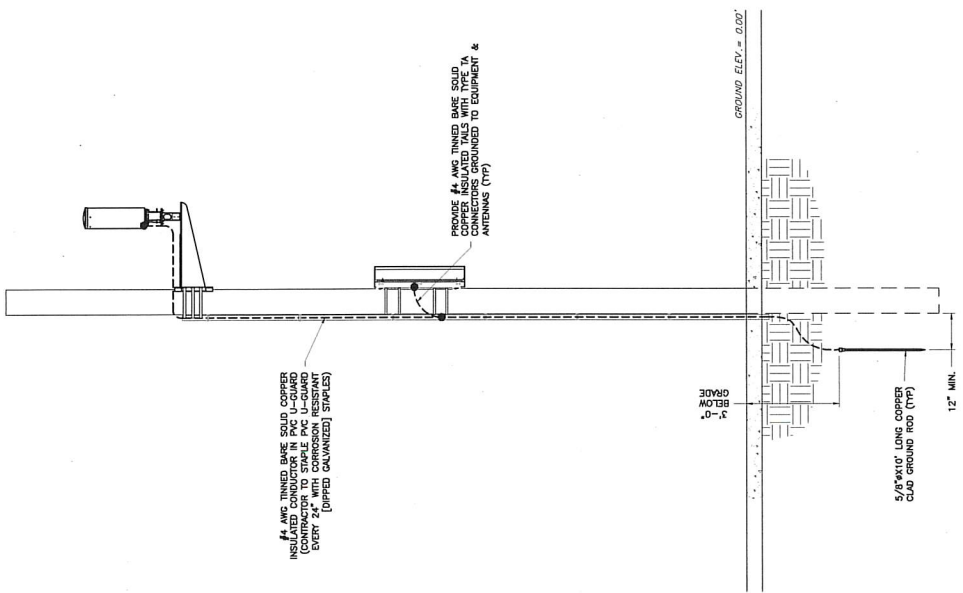
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1	05/15/19	FCG REVISED	NSB
2	08/09/19	STAMP ADDED	CWE
3	02/23/19	REVISED	NSB
4	01/26/20	MOUNT REVISED	DRG



KRUPAKARAN KOLLANDAVELU, P.E.
MA PROFESSIONAL ENGINEER LIC. #50019

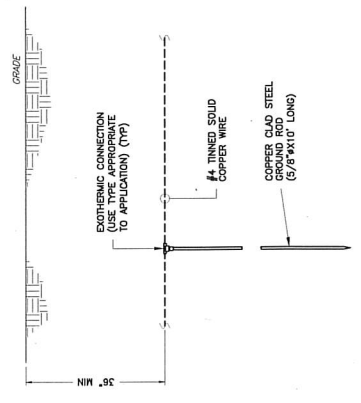
ELECTRICAL & GROUNDING DETAILS

ENGINEERING FIRM: NBC ENGINEERING SERVICES, LLC
APPLICANT: extenēt SYSTEMS
SITE INFORMATION: NE-MA-BSTN3N01-03342
DESIGN RECORD: 04/11/19
PROFESSIONAL STAMP: KRUPAKARAN KOLLANDAVELU, P.E.
ENGINEER: KRUPAKARAN KOLLANDAVELU, P.E.
SHEET TITLE: ELECTRICAL & GROUNDING DETAILS
SHEET NUMBER: 05 OF 05



3 ELECTRICAL & GROUNDING RISER DIAGRAM
05 NTS

NOTE: ALL PROPOSED UTILITY WIRES, SPIRES, AND EXISTING EQUIPMENT NOT SHOWN FOR CLARITY.



1 TYPICAL GROUND ROD DETAIL
05 NTS

- TYPE VS
- TYPE W
- TYPE SS
- TYPE NC
- TYPE VN
- TYPE TA
- TYPE VL
- TYPE GR
- TYPE GT
- TYPE FT
- TYPE VB

2 GROUNDING CONNECTION DETAILS
05 NTS