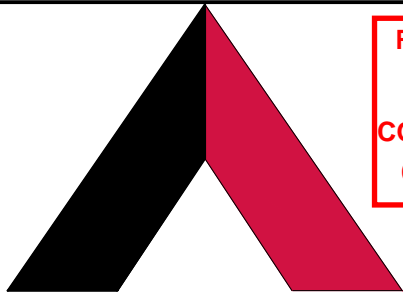


VICINITY MAP



REVIEWED
FOR
CODE
COMPLIANCE
09/16/2024

AMERICAN TOWER®

ATC SITE NAME: HWY 40 AND HWY 131

ATC SITE NUMBER: 205626

AT&T MOBILITY SITE ID: SICO001592

AT&T MOBILITY FA CODE: 11634072

AT&T SITE NAME: HWY 40 & HWY 131

SITE ADDRESS: 30700 COUNTY RD 14B

STEAMBOAT SPRINGS CO, 80487

AT&T MOBILITY IWM ID / PACE JOB NUMBER / PTN:

LTE: **WSUTH0034434 / MRUTH061588 / 3755A1A9BY**

LTE 2C: WSUTH0035217 / MRUTH062413 / 3755A1A9NW

5G NR RADIO: WSUTH0034861 / MRUTH061590 / 3755A1A9JQ

LTE SOFTWARE CARRIER: WSUTH0034646 / MRUTH062584 / 3755A1A972



LOCATION MAP

AT&T MOBILITY ANTENNA AMENDMENT PLAN

COMPLIANCE CODE	PROJECT SUMMARY	PROJECT DESCRIPTION	SHEET INDEX				
<p>ALL WORK SHALL BE PERFORMED AND MATERIALS INSTALLED IN ACCORDANCE WITH THE CURRENT EDITIONS OF THE FOLLOWING CODES AS ADOPTED BY THE LOCAL GOVERNMENT AUTHORITIES. NOTHING IN THESE PLANS IS TO BE CONSTRUED TO PERMIT WORK NOT CONFORMING TO THESE CODES.</p> <p>1. 2021 INTERNATIONAL BUILDING CODE (IBC)</p> <p>2. 2020 NATIONAL ELECTRIC CODE (NEC)</p> <p>3. LOCAL BUILDING CODE</p> <p>4. CITY/COUNTY ORDINANCES</p>	<p><u>SITE ADDRESS:</u></p> <p>30700 COUNTY RD 14B</p> <p>STEAMBOAT SPRINGS, CO 80487</p> <p>COUNTY: ROUTT</p> <p><u>GEOGRAPHIC COORDINATES:</u></p> <p>LATITUDE: 40.34121</p> <p>LONGITUDE: -106.85391</p> <p>GROUND ELEVATION: 7,139' AMSL</p> <p><u>ZONING INFORMATION:</u></p> <p>JURISDICTION: ROUTT COUNTY</p> <p>PARCEL ID: 947314001</p>	<p>THE PROPOSED PROJECT INCLUDES MODIFYING GROUND BASED AND TOWER MOUNTED EQUIPMENT AS INDICATED PER BELOW:</p> <p><u>TOWER WORK:</u></p> <p>REMOVE (9) ANTENNA(S), (6) RRH(s), AND (3) TMA(s).</p> <p>INSTALL (3) HOISTING ANCHOR GRIP(S), (3) PIPE(S), (6) PIPE TO PIPE CLAMP(S), (12) ANTENNA(S), (9) RRU(s), (1) SQUID(S), (3) 0.96" 6AWG DC POWER TRUNK(S), AND (2) 2" CONDUIT(S).</p> <p>EXISTING (1) SQUID(S), (1) 0.39" FIBER TRUNK(S), (2) 0.78" 8AWG DC POWER TRUNK(S), (6) 7/8" COAX CABLE(S), AND (2) 2" CONDUIT(S) TO REMAIN.</p> <p><u>GROUND WORK:</u></p> <p>REMOVE (1) +24VDC/-48VDC INDOOR POWER PLANT(S), (9) RECTIFIER(S), (5) CONVERTER MODULE(S), AND (8) GS PORTALAC PYL12V185FT BATTER(IES).</p> <p>INSTALL (1) VERTIV NETSURE 7100 -48VDC/-58VDC POWER PLANT(S), (1) CONVERTER SHELF(S), (2) 48VDC/+24VDC CONVERTER(S), (7) HE 1.6KW -48VDC/-58VDC CONVERTER MODULE(S), (8) ENERSYS POWERSAFE SBS-190F BATTER(IES), (3) 50A AIR6419 B77D DC BREAKER(S), (3) 50A 4490 B5/B12A DC BREAKER(S), (3) 50A 4890 B25/B66 DC BREAKER(S), (3) 25A 4494 B14 DC BREAKER(S), (2) 15A 6651 BBU DC BREAKER(S), (1) 25A 6601 DC BREAKER(S), AND (1) 250A +24V CONV FEED(S).</p>	SHEET NO:	DESCRIPTION:	REV:	DATE:	BY:
	G-001	TITLE SHEET	0	08/30/24	ANM		
	G-002	GENERAL NOTES	0	08/30/24	ANM		
	C-001	OVERALL SITE PLAN	0	08/30/24	ANM		
	C-101	DETAILED SITE PLAN	0	08/30/24	ANM		
	C-102	DETAILED EQUIPMENT LAYOUT	0	08/30/24	ANM		
	C-201	TOWER ELEVATION	0	08/30/24	ANM		
	C-401	ANTENNA INSTALLATION	0	08/30/24	ANM		
	C-402	ANTENNA SCHEDULE	0	08/30/24	ANM		
	C-501	CONSTRUCTION DETAILS	0	08/30/24	ANM		
E-101	ELECTRICAL DETAILS	0	08/30/24	ANM			
E-102	ELECTRICAL DETAILS	0	08/30/24	ANM			
E-501	GROUNDING DETAILS	0	08/30/24	ANM			
R-601	SUPPLEMENTAL						
R-602	SUPPLEMENTAL						
R-603	SUPPLEMENTAL						
R-604	SUPPLEMENTAL						
R-605	SUPPLEMENTAL						
R-606	SUPPLEMENTAL						
R-607	SUPPLEMENTAL						
R-608	SUPPLEMENTAL						
R-609	SUPPLEMENTAL						

GENERAL CONSTRUCTION NOTES:

1. OWNER FURNISHED MATERIALS, AT&T MOBILITY "THE COMPANY" WILL PROVIDE AND THE CONTRACTOR WILL INSTALL

A. BTS EQUIPMENT FRAME (PLATFORM) AND ICEBRIDGE SHELTER (GROUND BUILD/CO-LOCATE ONLY)

B. AC/TELCO INTERFACE BOX (PPC)

C. ICE BRIDGE (CABLE TRAY WITH COVER) (GROUND BUILD/CO-LOCATE ONLY, GC TO FURNISH AND INSTALL FOR ROOFTOP INSTALLATION)

D. TOWERS, MONOPOLES

E. TOWER LIGHTING

F. GENERATORS & LIQUID PROPANE TANK

G. ANTENNA STANDARD BRACKETS, FRAMES AND PIPES FOR MOUNTING

H. ANTENNAS (INSTALLED BY OTHERS)

I. TRANSMISSION LINE

J. TRANSMISSION LINE JUMPERS

K. TRANSMISSION LINE CONNECTORS WITH WEATHERPROOFING KITS

L. TRANSMISSION LINE GROUND KITS

M. HANGERS

N. HOISTING GRIPS

O. BTS EQUIPMENT
2. THE CONTRACTOR IS RESPONSIBLE TO PROVIDE ALL OTHER MATERIALS FOR THE COMPLETE INSTALLATION OF THE SITE INCLUDING, BUT NOT LIMITED TO, SUCH MATERIALS AS FENCING, STRUCTURAL STEEL SUPPORTING SUB-FRAME FOR PLATFORM, ROOFING LABOR AND MATERIALS, GROUNDING RINGS, GROUNDING WIRES, COPPER-CLAD OR XIT CHEMICAL GROUND ROD(S), BUSS BARS, TRANSFORMERS AND DISCONNECT SWITCHES WHERE APPLICABLE, TEMPORARY ELECTRICAL POWER, CONDUIT, LANDSCAPING COMPOUND STONE, CRANES, CORE DRILLING, SLEEPERS AND RUBBER MATTING, REBAR, CONCRETE CAISSONS, PADS AND/OR AUGER MOUNTS, MISCELLANEOUS FASTENERS, CABLE TRAYS, NON-STANDARD ANTENNA FRAMES AND ALL OTHER MATERIAL AND LABOR REQUIRED TO COMPLETE THE JOB ACCORDING TO THE DRAWINGS AND SPECIFICATIONS. IT IS THE POSITION OF AT&T MOBILITY TO APPLY FOR PERMITTING AND CONTRACTOR RESPONSIBLE FOR PICKUP AND PAYMENT OF REQUIRED PERMITS.
3. ALL WORK SHALL CONFORM TO ALL CURRENT APPLICABLE FEDERAL, STATE, AND LOCAL CODES, INCLUDING ANSI/EIA/TIA-222, AND COMPLY WITH ATC CONSTRUCTION SPECIFICATIONS.
4. CONTRACTOR SHALL CONTACT LOCAL 811 FOR IDENTIFICATION OF UNDERGROUND UTILITIES PRIOR TO START OF CONSTRUCTION.
5. CONTRACTOR SHALL BE RESPONSIBLE FOR COORDINATING ALL REQUIRED INSPECTIONS.
6. ALL DIMENSIONS TO, OF, AND ON EXISTING BUILDINGS, DRAINAGE STRUCTURES, AND SITE IMPROVEMENTS SHALL BE VERIFIED IN FIELD BY CONTRACTOR WITH ALL DISCREPANCIES REPORTED TO THE ENGINEER.
7. DO NOT CHANGE SIZE OR SPACING OF STRUCTURAL ELEMENTS.
8. DETAILS SHOWN ARE TYPICAL; SIMILAR DETAILS APPLY TO SIMILAR CONDITIONS UNLESS OTHERWISE NOTED.
9. THESE DRAWINGS DO NOT INCLUDE NECESSARY COMPONENTS FOR CONSTRUCTION SAFETY WHICH SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR.
10. CONTRACTOR SHALL BRACE STRUCTURES UNTIL ALL STRUCTURAL ELEMENTS NEEDED FOR STABILITY ARE INSTALLED. THESE ELEMENTS ARE AS FOLLOWS: LATERAL BRACING, ANCHOR BOLTS, ETC.
11. CONTRACTOR SHALL DETERMINE EXACT LOCATION OF EXISTING UTILITIES, GROUNDS DRAINS, DRAIN PIPES, VENTS, ETC. BEFORE COMMENCING WORK.
12. INCORRECTLY FABRICATED, DAMAGED, OR OTHERWISE MISFITTING OR NONCONFORMING MATERIALS OR CONDITIONS SHALL BE REPORTED TO THE AT&T MOBILITY REP PRIOR TO REMEDIAL OR CORRECTIVE ACTION. ANY SUCH REMEDIAL ACTION SHALL REQUIRE WRITTEN APPROVAL BY THE AT&T MOBILITY REP PRIOR TO PROCEEDING.
13. EACH CONTRACTOR SHALL COOPERATE WITH THE AT&T MOBILITY REP, AND COORDINATE HIS WORK WITH THE WORK OF OTHERS.
14. CONTRACTOR SHALL REPAIR ANY DAMAGE CAUSED BY CONSTRUCTION OF THIS PROJECT TO MATCH EXISTING PRE-CONSTRUCTION CONDITIONS TO THE SATISFACTION OF THE AT&T MOBILITY CONSTRUCTION MANAGER.
15. ALL CABLE/CONDUIT ENTRY/EXIT PORTS SHALL BE WEATHERPROOFED DURING INSTALLATION USING A SILICONE SEALANT.
16. WHERE EXISTING CONDITIONS DO NOT MATCH THOSE SHOWN IN THIS PLAN SET, CONTRACTOR SHALL NOTIFY THE AT&T MOBILITY REP AND ENGINEER OF RECORD IMMEDIATELY.
17. CONTRACTOR SHALL ENSURE ALL SUBCONTRACTORS ARE PROVIDED WITH A COMPLETE AND CURRENT SET OF DRAWINGS AND SPECIFICATIONS FOR THIS PROJECT.
18. CONTRACTOR SHALL REMOVE ALL RUBBISH AND DEBRIS FROM THE SITE AT THE END OF EACH DAY.
19. CONTRACTOR SHALL COORDINATE WORK SCHEDULE WITH AMERICAN TOWER CORPORATION (ATC) AND TAKE PRECAUTIONS TO MINIMIZE IMPACT AND DISRUPTION OF OTHER OCCUPANTS OF THE FACILITY.
20. CONTRACTOR SHALL FURNISH AT&T MOBILITY AND AMERICAN TOWER CORPORATION (ATC) WITH A PDF MARKED UP AS-BUILT SET OF DRAWINGS UPON COMPLETION OF WORK.
21. PRIOR TO SUBMISSION OF BID, CONTRACTOR SHALL COORDINATE WITH AT&T MOBILITY REP TO DETERMINE WHAT, IF ANY, ITEMS WILL BE PROVIDED. ALL ITEMS NOT PROVIDED SHALL BE PROVIDED AND INSTALLED BY THE CONTRACTOR. CONTRACTOR WILL INSTALL ALL ITEMS

PROVIDED.

22. PRIOR TO SUBMISSION OF BID, CONTRACTOR SHALL COORDINATE WITH AT&T MOBILITY REP TO DETERMINE IF ANY PERMITS WILL BE OBTAINED BY CONTRACTOR. ALL REQUIRED PERMITS NOT OBTAINED BY AT&T MOBILITY MUST BE OBTAINED, AND PAID FOR, BY THE CONTRACTOR.
23. CONTRACTOR SHALL INSTALL ALL SITE SIGNAGE IN ACCORDANCE WITH AT&T MOBILITY SPECIFICATIONS AND REQUIREMENTS.
24. CONTRACTOR SHALL SUBMIT ALL SHOP DRAWINGS TO AT&T MOBILITY FOR REVIEW AND APPROVAL PRIOR TO FABRICATION.
25. ALL EQUIPMENT SHALL BE INSTALLED ACCORDING TO MANUFACTURER'S SPECIFICATIONS AND LOCATED ACCORDING TO AT&T MOBILITY SPECIFICATIONS, AND AS SHOWN IN THESE PLANS.
26. THE CONTRACTOR SHALL SUPERVISE AND DIRECT THE PROJECT DESCRIBED HEREIN. THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR ALL THE CONSTRUCTION MEANS, METHODS, TECHNIQUES, SEQUENCES AND PROCEDURES AND FOR COORDINATING ALL PORTIONS OF THE WORK UNDER THE CONTRACT.
27. CONTRACTOR SHALL NOTIFY AT&T MOBILITY REP A MINIMUM OF 48 HOURS IN ADVANCE OF POURING CONCRETE OR BACKFILLING ANY UNDERGROUND UTILITIES, FOUNDATIONS OR SEALING ANY WALL, FLOOR OR ROOF PENETRATIONS FOR ENGINEERING REVIEW AND APPROVAL.
28. WHEN THE PROJECT SCOPE REQUIRES THE USE OF THE SAFETY CLIMB, THE GENERAL CONTRACTOR SHALL ENSURE THE SAFETY CLIMB IS FREE OF OBSTRUCTIONS, NOT RUBBING ON OR TRAPPED BY ANY INSTALLED CUSTOMER EQUIPMENT, IS VISUALLY TAUT, MEETS MANUFACTURER INSTALLATION SPECIFICATIONS, AND IS FIRMLY SECURED AT ALL CABLE GUIDE LOCATIONS UPON PROJECT COMPLETION.
29. COMPLETION OF PROJECT SHALL NOT OBSTRUCT, TRAP, LOOSEN, OR OTHERWISE CAUSE FAILURE TO MEET MANUFACTURER INSTALLATION REQUIREMENTS FOR THE SAFETY CLIMB.
30. CONTRACTOR SHALL BE RESPONSIBLE FOR SITE SAFETY INCLUDING COMPLIANCE WITH ALL APPLICABLE OSHA STANDARDS AND RECOMMENDATIONS AND SHALL PROVIDE ALL NECESSARY SAFETY DEVICES INCLUDING PPE AND PPM AND CONSTRUCTION DEVICES SUCH AS WELDING AND FIRE PREVENTION, TEMPORARY SHORING, SCAFFOLDING, TRENCH BOXES/SLOPING, BARRIERS, ETC.
31. THE CONTRACTOR SHALL PROTECT AT HIS OWN EXPENSE, ALL EXISTING FACILITIES AND SUCH OF HIS NEW WORK LIABLE TO INJURY DURING THE CONSTRUCTION PERIOD. ANY DAMAGE CAUSED BY NEGLECT ON THE PART OF THIS CONTRACTOR OR HIS REPRESENTATIVES, OR BY THE ELEMENTS DUE TO NEGLECT ON THE PART OF THIS CONTRACTOR OR HIS REPRESENTATIVES, EITHER TO THE EXISTING WORK, OR TO HIS WORK OR THE WORK OF ANY OTHER CONTRACTOR, SHALL BE REPAIRED AT HIS EXPENSE TO THE OWNER'S SATISFACTION.
32. ALL WORK SHALL BE INSTALLED IN A FIRST CLASS, NEAT AND WORKMANLIKE MANNER BY MECHANICS SKILLED IN THE TRADE INVOLVED. THE QUALITY OF WORKMANSHIP SHALL BE SUBJECT TO THE APPROVAL OF THE AT&T MOBILITY REP. ANY WORK FOUND BY THE AT&T MOBILITY REP TO BE OF INFERIOR QUALITY AND/OR WORKMANSHIP SHALL BE REPLACED AND/OR REWORKED AT CONTRACTOR EXPENSE UNTIL APPROVAL IS OBTAINED.
33. IN ORDER TO ESTABLISH STANDARDS OF QUALITY AND PERFORMANCE, ALL TYPES OF MATERIALS LISTED HEREINAFTER BY MANUFACTURER'S NAMES AND/OR MANUFACTURER'S CATALOG NUMBER SHALL BE PROVIDED BY THESE MANUFACTURERS AS SPECIFIED.
34. AT&T MOBILITY FURNISHED EQUIPMENT SHALL BE PICKED-UP AT THE AT&T MOBILITY WAREHOUSE, NO LATER THAN 48HR AFTER BEING NOTIFIED INSURED, STORED, UNCRATE, PROTECTED AND INSTALLED BY THE CONTRACTOR WITH ALL APPURTENANCES REQUIRED TO PLACE THE EQUIPMENT IN OPERATION, READY FOR USE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE EQUIPMENT AFTER PICKING IT UP.
35. AT&T MOBILITY OR HIS ARCHITECT/ENGINEER RESERVES THE RIGHT TO REJECT ANY EQUIPMENT OR MATERIALS WHICH, IN HIS OWN OPINION ARE NOT IN COMPLIANCE WITH THE CONTRACT DOCUMENTS, EITHER BEFORE OR AFTER INSTALLATION AND THE EQUIPMENT SHALL BE REPLACED WITH EQUIPMENT CONFORMING TO THE REQUIREMENTS OF THE CONTRACT DOCUMENTS BY THE CONTRACTOR AT NO COST TO AT&T MOBILITY OR THEIR ARCHITECT/ENGINEER.

SPECIAL CONSTRUCTION

ANTENNA INSTALLATION NOTES:

1. WORK INCLUDED:

A. ANTENNA AND COAXIAL CABLES ARE FURNISHED BY AT&T MOBILITY UNDER A SEPARATE CONTRACT. THE CONTRACTOR SHALL ASSIST ANTENNA INSTALLATION CONTRACTOR IN TERMS OF COORDINATION AND SITE ACCESS. ERECTION SUBCONTRACTOR SHALL BE RESPONSIBLE FOR THE PROTECTION OF PERSONNEL.

B. INSTALL ANTENNAS AS INDICATED ON DRAWINGS AND AT&T MOBILITY SPECIFICATIONS.

C. INSTALL GALVANIZED STEEL ANTENNA MOUNTS AS INDICATED ON DRAWINGS.

D. INSTALL FURNISHED GALVANIZED STEEL OR ALUMINUM WAVEGUIDE.

E. CONTRACTOR SHALL PROVIDE FOUR (4) SETS OF SWEEP TESTS USING ANRITZU-PACKARD 8713B RF SCALAR NETWORK ANALYZER. SUBMIT FREQUENCY DOMAIN REFLECTOMETER(FDR) TESTS RESULTS TO THE PROJECT MANAGER. SWEEP TESTS SHALL BE AS PER ATTACHED RFS "MINIMUM FIELD TESTING RECOMMENDED FOR ANTENNA AND HELIAX COAXIAL CABLE SYSTEMS" DATED 10/5/93. TESTING SHALL BE PERFORMED BY AN INDEPENDENT TESTING SERVICE AND BE BOUND AND SUBMITTED WITHIN ONE WEEK OF WORK COMPLETION.

F. INSTALL COAXIAL CABLES AND TERMINATING BETWEEN ANTENNAS AND EQUIPMENT PER MANUFACTURER'S RECOMMENDATIONS. WEATHERPROOF ALL CONNECTIONS BETWEEN THE

ANTENNA AND EQUIPMENT PER MANUFACTURER'S REQUIREMENTS. TERMINATE ALL COAXIAL CABLE THREE (3) FEET IN EXCESS OF ENTRY PORT LOCATION UNLESS OTHERWISE STATED.

- G. ANTENNA AND COAXIAL CABLE GROUNDING:
2. ALL EXTERIOR #6 GREEN GROUND WIRE "DAISY CHAIN" CONNECTIONS ARE TO BE WEATHER SEALED WITH RFS CONNECTORS/SPLICE WEATHERPROOFING KIT #221213 OR EQUAL.
3. ALL COAXIAL CABLE GROUNDING KITS ARE TO BE INSTALLED ON STRAIGHT RUNS OF COAXIAL CABLE (NOT WITHIN BENDS)

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ALL DISCREPANCIES FROM WHAT IS SHOWN ON THESE CONSTRUCTION DRAWINGS SHALL BE COMMUNICATED TO ATC ENGINEERING IMMEDIATELY FOR CORRECTION OR RE-DESIGN. FAILURE TO COMMUNICATE DIRECTLY WITH ATC ENGINEERING OR ANY CHANGES FROM THE DESIGN CONDUCTED WITHOUT PRIOR APPROVAL FROM ATC ENGINEERING SHALL BE THE SOLE RESPONSIBILITY OF THE GENERAL CONTRACTOR.



PLANS PREPARED BY:

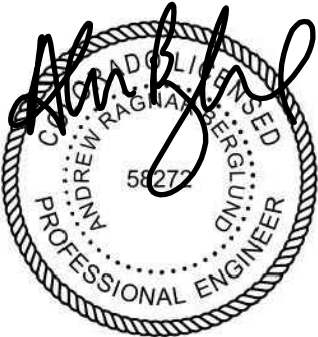


326 TRYON ROAD
RALEIGH, NC 27603-3530
OFFICE: (919) 661-6351
www.tepgroup.net

REV.	DESCRIPTION	BY	DATE
A	PRELIMINARY	ANM	08/14/24
B	100% CONSTRUCTION	JMH	08/30/24

ATC SITE NUMBER: 205626
ATC SITE NAME: HWY 40 AND HWY 131
AT&T MOBILITY SITE NUMBER:
SICO001592
AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131
SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487

SEAL:



08/30/24



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

GENERAL NOTES

SHEET NUMBER: G-002	REVISION: 0
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1. BOUNDARY LINES OBTAINED FROM ROUTT COUNTY ONLINE GIS.
2. ZONING INFORMATION OBTAINED FROM ROUTT COUNTY.
3. THE TOWER IS LOCATED IN ZONE "X." AREAS DETERMINED TO BE OUTSIDE THE 0.2% ANNUAL CHANCE FLOODPLAIN ACCORDING TO FEMA COMMUNITY PANEL #08107C1055D, DATED FEBRUARY 04, 2005.

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TEP

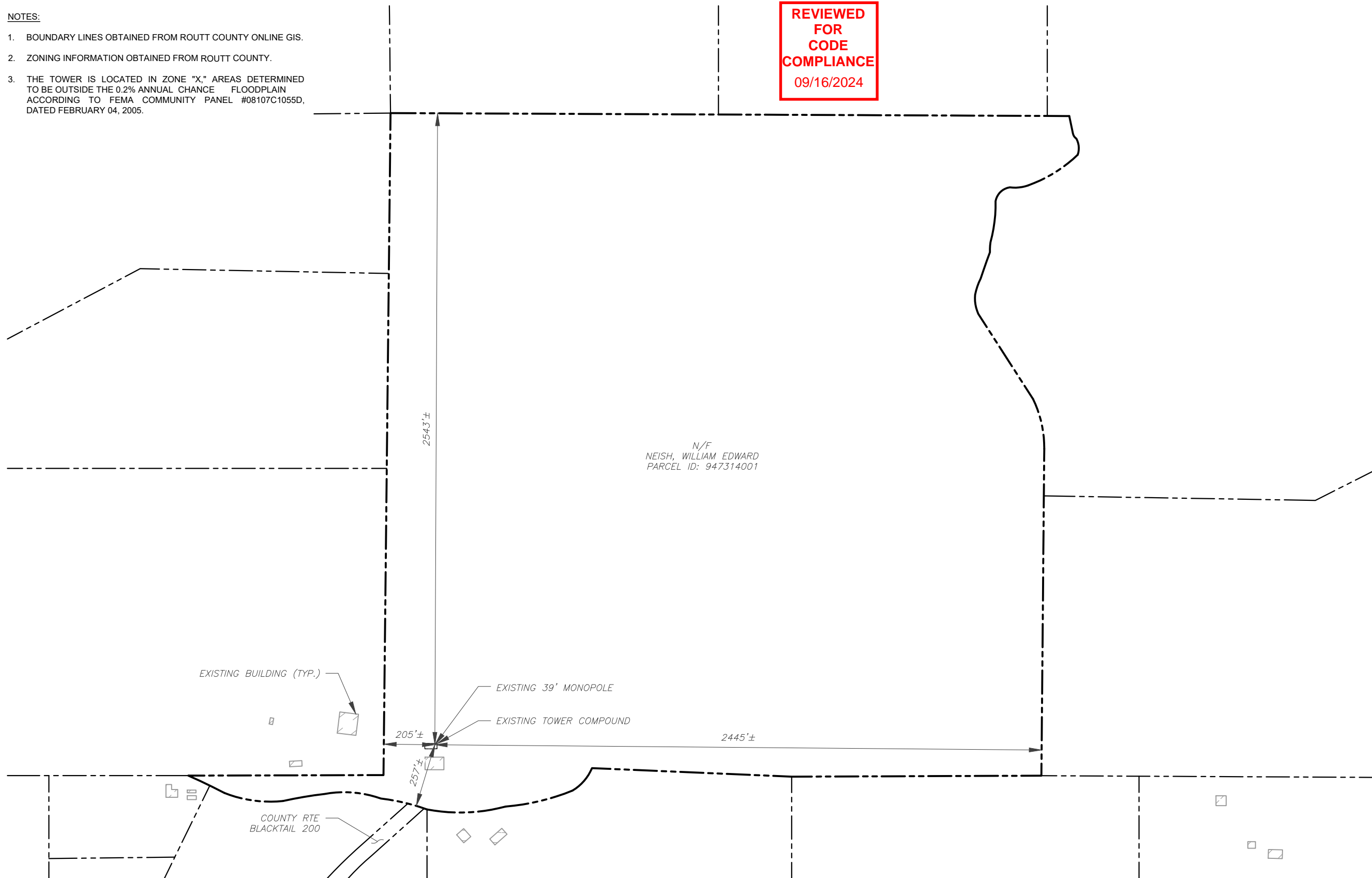
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SEAL:



OVERALL SITE PLAN

SHEET NUMBER: C-001	REVISION: 0
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— — — — — EXISTING PROPERTY LINE
 — — — — — EXISTING ADJACENT PROPERTY LINE
 — — — — — EXISTING LEASE AREA

1 OVERALL SITE PLAN
SCALE 1" = 400'

SCALE 1" = 400'



SCALE: 1"=400' (11X17)
1"=200' (22X34)



SITE PLAN NOTES:

1. THIS SITE PLAN REPRESENTS THE BEST PRESENT KNOWLEDGE AVAILABLE TO THE ENGINEER AT THE TIME OF THIS DESIGN. THE CONTRACTOR SHALL VISIT THE SITE PRIOR TO CONSTRUCTION AND VERIFY ALL EXISTING CONDITIONS RELATED TO THE SCOPE OF WORK FOR THIS PROJECT.
2. ICE BRIDGE, CABLE LADDER, COAX PORT, AND COAX CABLE ARE SHOWN FOR REFERENCE ONLY. CONTRACTOR SHALL CONFIRM THE EXACT LOCATION OF ALL PROPOSED AND EXISTING EQUIPMENT AND STRUCTURES DEPICTED ON THIS PLAN. BEFORE UTILIZING EXISTING CABLE SUPPORTS, COAX PORTS, INSTALLING NEW PORTS OR ANY OTHER EQUIPMENT, CONTRACTOR SHALL VERIFY ALL ASPECTS OF THE COMPONENTS MEET THE ATC SPECIFICATIONS.
3. THIS CONSTRUCTION DRAWING SET IS NOT INTENDED TO REPRESENT ANY ELECTRICAL DESIGN OTHER THAN THE GROUNDING SHOWN, OR TO BE USED TO OBTAIN AN ELECTRICAL PERMIT. AN ELECTRICAL PERMIT IS REQUIRED TO WIRE UP THE PROPOSED EQUIPMENT. ANY ELECTRICAL UPGRADES WILL BE ENGINEERED AND PERMITTED IN A SEPARATE CONSTRUCTION DRAWING SET.

LEGEND

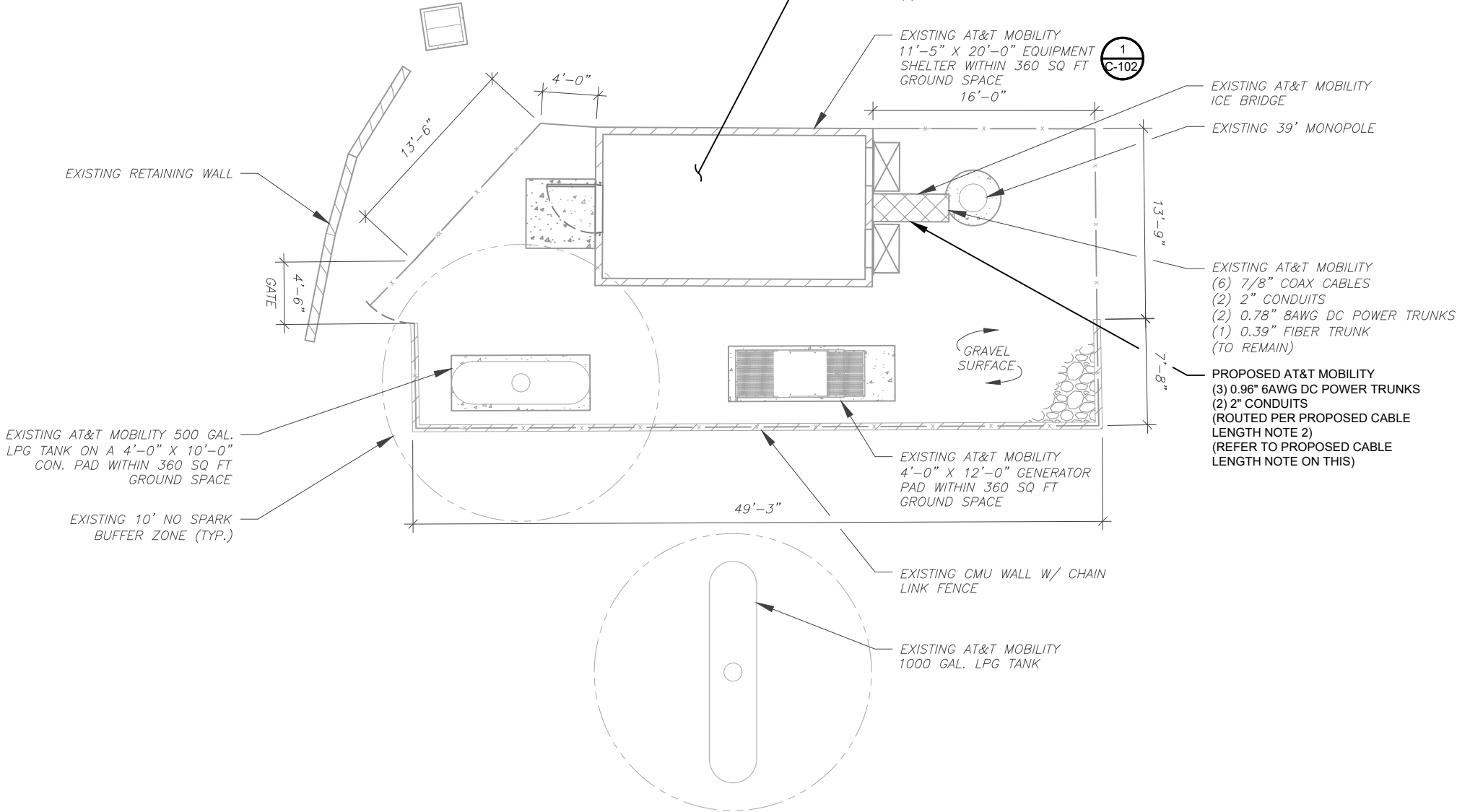
⊗	GROUNDING TEST WELL
ATS	AUTOMATIC TRANSFER SWITCH
B	BOLLARD
CSC	CELL SITE CABINET
D	DISCONNECT
E	ELECTRICAL
F	FIBER
GEN	GENERATOR
G	GENERATOR RECEPTACLE
HH, V	HAND HOLE, VAULT
IB	ICE BRIDGE
K	KENTROX BOX
LC	LIGHTING CONTROL
M	METER
PB	PULL BOX
PP	POWER POLE
T	TELCO
TRN	TRANSFORMER
—x—	CHAINLINK FENCE

GROUND EQUIPMENT:

- (1) VERTIV NETSURE 7100 -48VDC POWER PLANT
(1) CONVERTER SHELF
(2) 48VDC/+24VDC CONVERTERS
(7) HE 1.6KW -48VDC/-58VDC CONVERTER MODULES
(8) ENERSYS POWERSAFE SBS-190F BATTERIES
(9) 50A DC BREAKERS
(4) 25A DC BREAKERS
(2) 15A DC BREAKERS
(2) 250A DC BREAKERS

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- PROPOSED AT&T MOBILITY EQUIPMENT
TO BE INSTALLED INSIDE EXISTING
EQUIPMENT SHELTER AND INSIDE CABINETS:
(1) VERTIV NETSURE 7100 -48VDC POWER PLANT
(1) CONVERTER SHELF
(2) 48VDC/+24VDC CONVERTERS
(7) HE 1.6KW -48VDC/-58VDC CONVERTER MODULES
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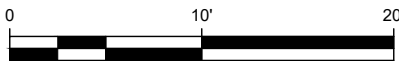


PROPOSED CABLE NOTES:

1. ESTIMATED LENGTH OF PROPOSED CABLE IS **70'**. ESTIMATED LENGTH OF CABLE WAS PROVIDED BY CUSTOMER OR CALCULATED BY ADDING THE RAD CENTER AND THE DISTANCE FROM THE SHELTER ENTRY PLATE TO THE TOWER (ALONG THE ICE BRIDGE) AND A SAFETY FACTOR MEASUREMENT OF 15% (OF THE TWO PREVIOUS VALUES). CDS DEFER TO GREATEST CABLE LENGTH.
2. ROUTE PROPOSED CABLES ALONG SAME PATH AS EXISTING CABLES AND IN ACCORDANCE WITH STRUCTURAL ANALYSIS. IF ADEQUATE SPACE EXISTS, ROUTE CABLES THROUGH ENTRY PORT HOLE, UP INSIDE OF MONOPOLE, AND THROUGH EXIT PORT HOLE. IF ROUTING OUTSIDE THE MONOPOLE, ATTACH CABLES USING STAND-OFF ADAPTERS MOUNTED TO TOWER USING STAINLESS STEEL BANDING. ADEQUATELY SECURE CABLES USING EITHER APPROPRIATELY SIZED STAINLESS STEEL SNAP-INS OR MOUNTING HARDWARE AND BRACKETS AS SPECIFIED BY CABLE MANUFACTURER.

1 DETAILED SITE PLAN

SCALE : 1" = 10'



SCALE: 1"=10' (11X17)
1"=5' (22X34)



PLANS PREPARED BY:



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08/30/24



DATE DRAWN:	08/30/24
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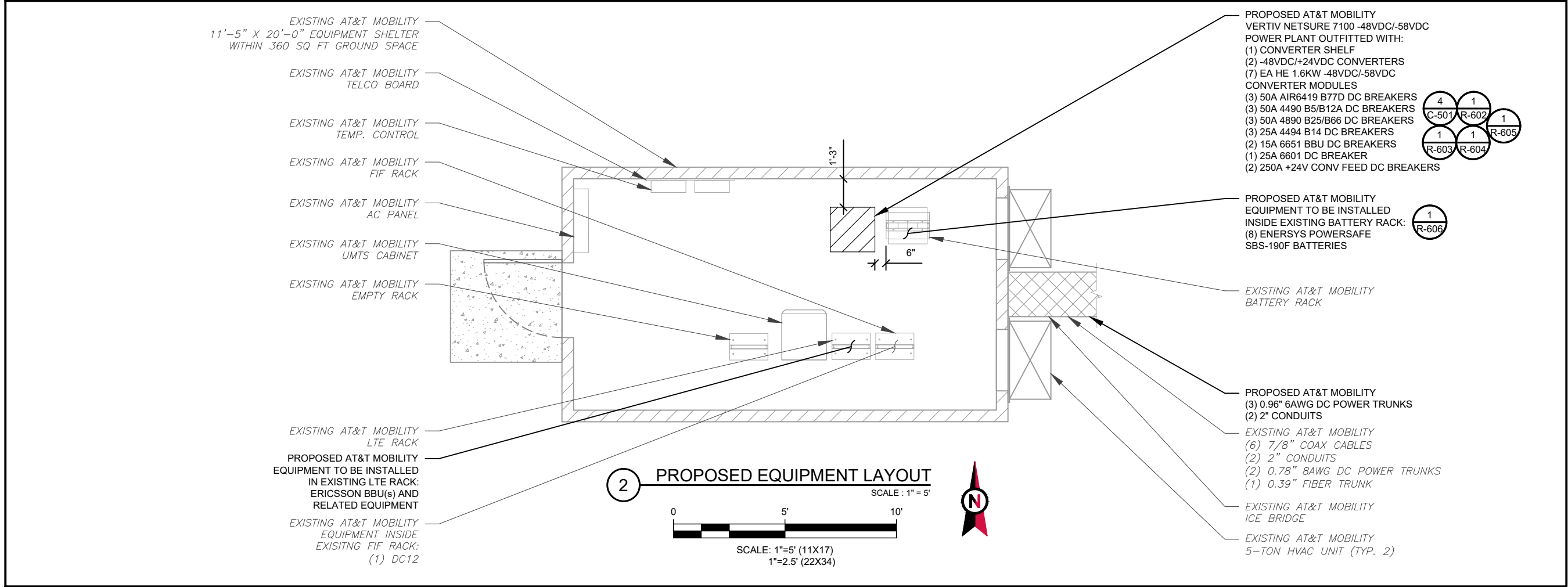
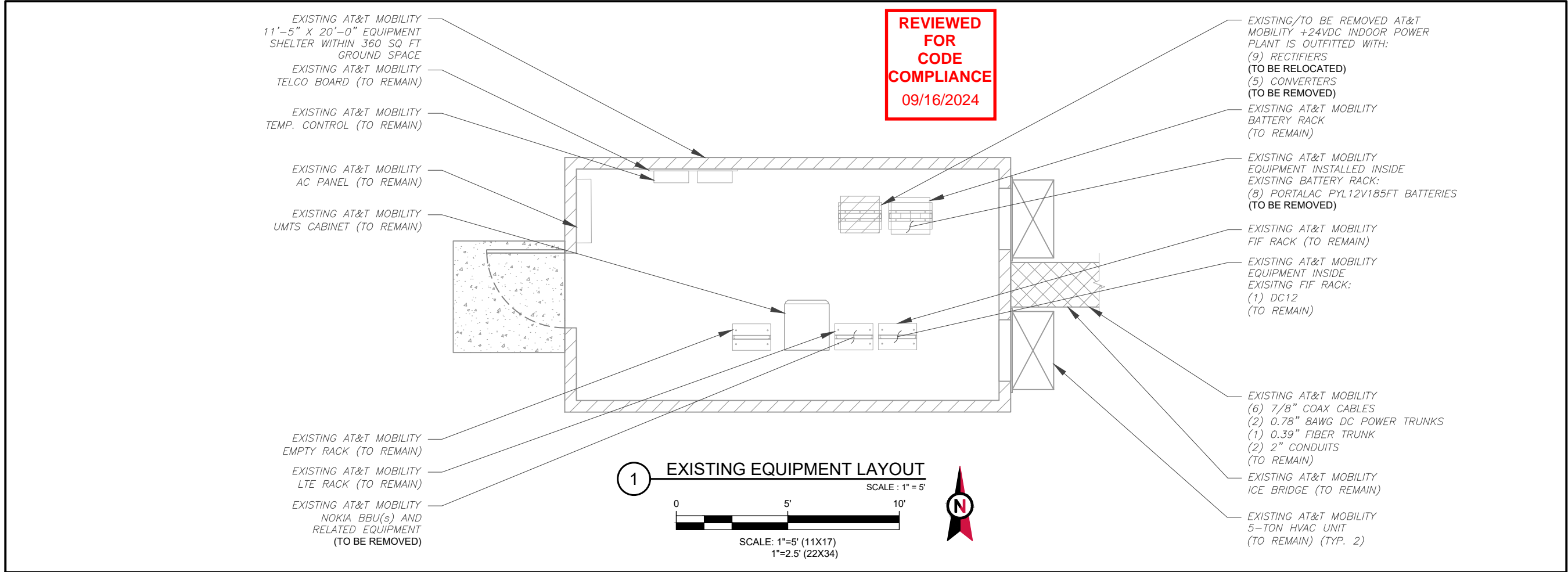
DETAILED SITE PLAN

SHEET NUMBER:

C-101

REVISION:

0



PLANS PREPARED BY:



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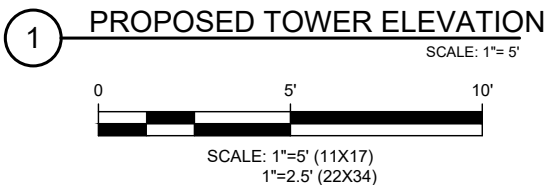
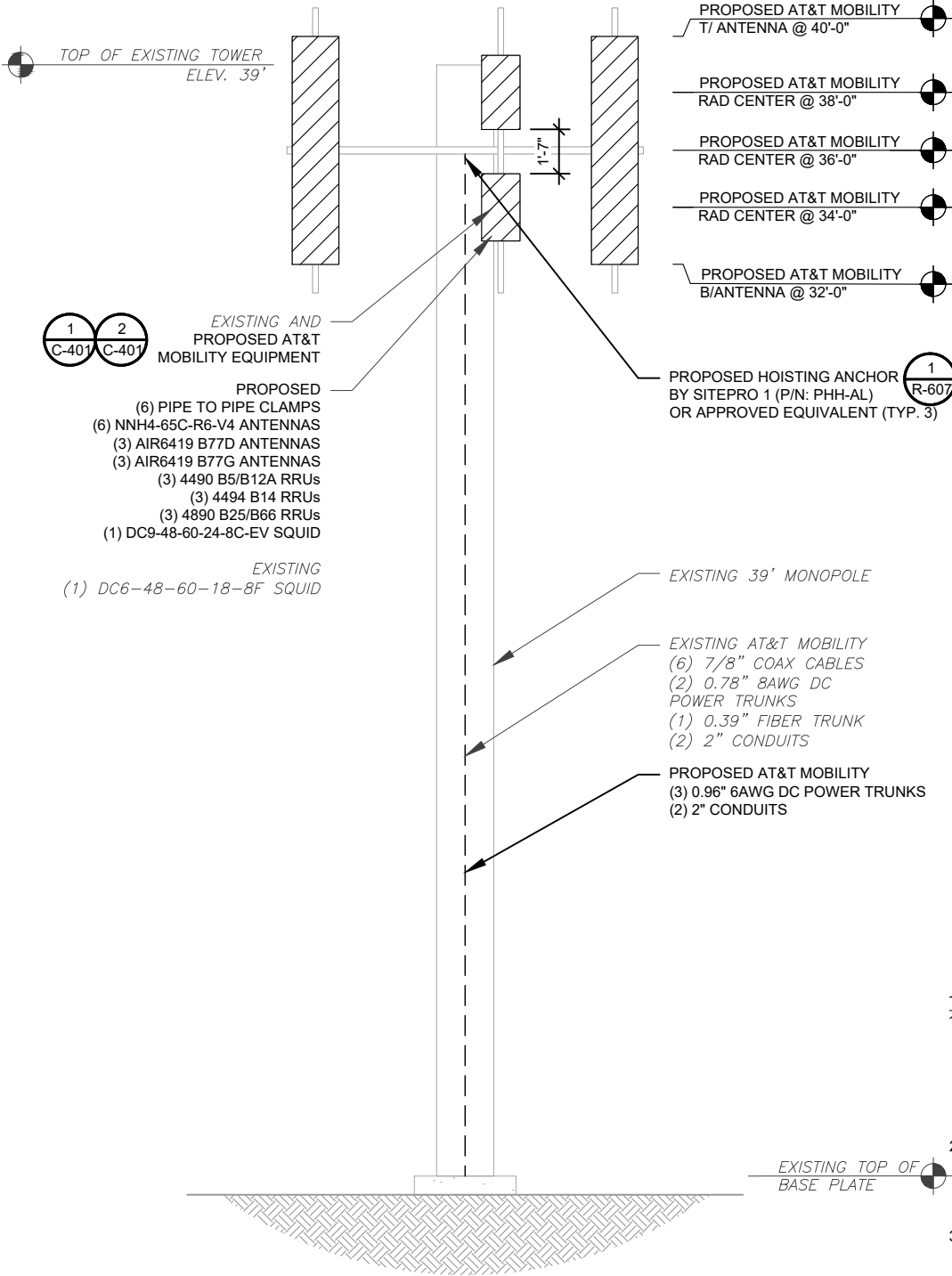
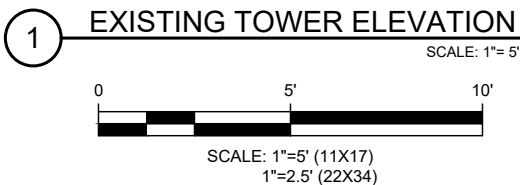
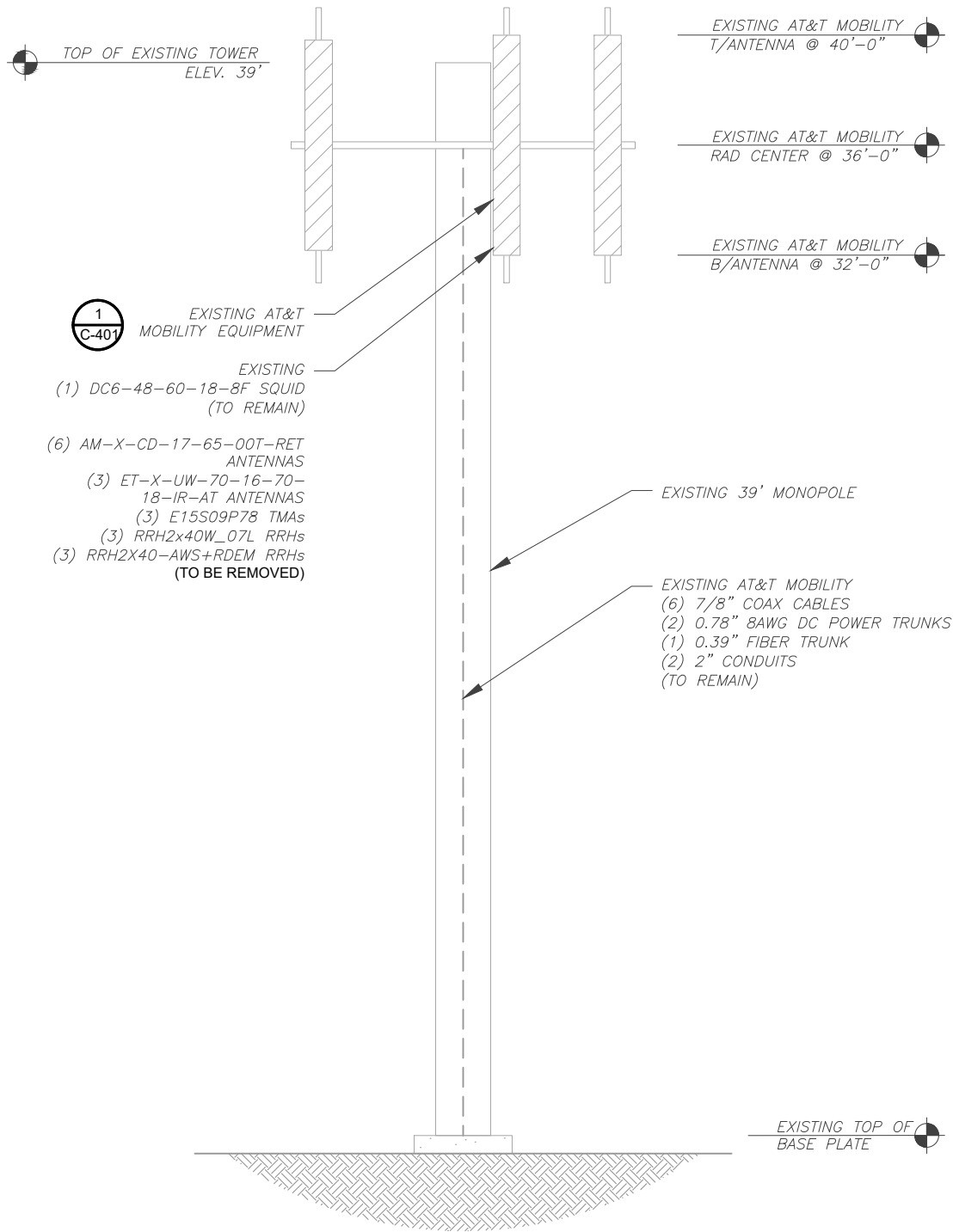
08/30/24



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

DETAILED EQUIPMENT
LAYOUT

SHEET NUMBER:
C-102
REVISION:
0



ATC IS ANALYZING THE ANTENNA MOUNT UNDER A SEPARATE PROJECT. CONSTRUCTION IS NOT TO PROCEED UNTIL THE MOUNT ANALYSIS IS COMPLETE AND INDICATES THE ADDITIONAL LOADING DOES NOT OVERSTRESS THE MOUNT.

DETAILED SOW:
TOPSIDE
REMOVE (3) ET-X-UW-70-16-70-18-IR-AT ANTENNAS
REMOVE (6) AM-X-CD-17-65-00T-RET ANTENNAS
REMOVE (3) RRH2X40-AWS+RDEM RRHs
REMOVE (3) RRH2x40W-07L RRHs
REMOVE (3) E15S09P78 TMAs
INSTALL (3) CABLE HOISTING GRIPS
INSTALL (6) PIPE TO PIPE CLAMPS
INSTALL (6) NNH4-65C-R6-V4 ANTENNAS
INSTALL (3) AIR6419 B77D ANTENNAS
INSTALL (3) AIR6419 B77G ANTENNAS
INSTALL (3) 4490 B5/B12A RRUs
INSTALL (3) 4494 B14 RRUs
INSTALL (3) 4890 B25/B66 RRUs
INSTALL (1) DC9-48-60-24-8C-EV SQUID
INSTALL (2) 2" CONDUITS
INSTALL (3) 0.96" 6AWG DC POWER TRUNKS
RETAIN (1) DC6-48-60-18-8F SQUID
RETAIN (6) 7/8" COAX CABLES
RETAIN (2) 2" CONDUITS
RETAIN (1) 0.39" FIBER TRUNK
RETAIN (2) 0.78" 8AWG DC POWER TRUNKS
RETAIN (9) EA. HE 2KW -48VDC RECTIFIERS
TEST NEW LINES PER MARKET SPEC
LABEL NEW CABLES PER MARKET SPEC
GROUND NEW EQUIPMENT PER MARKET SPEC
BOTTOMSIDE
-REMOVE (1) +24VDC/-48VDC INDOOR POWER PLANT
-REMOVE (5) CONVERTERS
-REMOVE (8) GS PORTALAC PYL12V185FT BATTERIES
-INSTALL (1) VERTIV NETSURE 7100 -48VDC/-58VDC POWER PLANT
-INSTALL (1) CONVERTER SHELF
-INSTALL (2) 48VDC/+24VDC CONVERTERS
-INSTALL (7) EA HE 1.6KW -48VDC/-58VDC CONVERTER MODULES
-INSTALL (8) ENERSYS POWERSAFE SBS-190F BATTERIES
-INSTALL (3) 50A AIR6419 B77D DC BREAKERS
-INSTALL (3) 50A 4890 B25/B66 DC BREAKERS
-INSTALL (3) 50A 4490 B5/B12A DC BREAKERS
-INSTALL (3) 25A 4494 B14 DC BREAKERS
-INSTALL (2) 15A 6651 BBU DC BREAKERS
-INSTALL (1) 25A 6601 DC BREAKER
-INSTALL (2) 250A +24V CONVERTER FEED DC BREAKERS
TEST NEW LINES PER MARKET SPEC
LABEL NEW CABLES PER MARKET SPEC
GROUND NEW EQUIPMENT PER MARKET SPEC

- TOWER NOTES:
- IT IS THE CONTRACTOR'S RESPONSIBILITY TO CONFIRM WITH THE PROJECT MANAGER THAT THEY HAVE THE MOST RECENT VERSION OF THE STRUCTURAL ANALYSIS BEFORE COMMENCING WORK. EXISTING AND PROPOSED TOWER APPURTENANCES, MOUNTS, AND ANTENNAS ARE SHOWN BASED ON THE STRUCTURAL ANALYSIS.
 - WHERE APPLICABLE, ALL NEW ANTENNAS, EQUIPMENT, MOUNTS, CABLING, ETC. SHALL BE PAINTED/SOCKED TO MATCH EXISTING EQUIPMENT IN ACCORDANCE WITH FAA, JURISDICTION, AND/OR OTHER LOCAL REQUIREMENTS.
 - ROUTE PROPOSED CABLES ALONG SAME PATH AS EXISTING CABLES AND IN ACCORDANCE WITH STRUCTURAL ANALYSIS. IF ADEQUATE SPACE EXISTS, ROUTE CABLES THROUGH ENTRY PORT HOLE, UP INSIDE OF MONOPOLE, AND THROUGH EXIT PORT HOLE. IF ROUTING OUTSIDE THE MONOPOLE, ATTACH CABLES USING STAND-OFF ADAPTERS MOUNTED TO TOWER USING STAINLESS STEEL BANDING. ADEQUATELY SECURE CABLES USING EITHER APPROPRIATELY SIZED STAINLESS STEEL SNAP-INS OR MOUNTING HARDWARE AND BRACKETS AS SPECIFIED BY CABLE MANUFACTURER.
 - TOWER ELEVATION DEPICTION MAY NOT REFLECT ALL EQUIPMENT INCLUDED IN STRUCTURAL ANALYSIS. REFER TO STRUCTURAL ANALYSIS FOR FULL TOWER LOADING.



PLANS PREPARED BY:



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

REV.	DESCRIPTION	BY	DATE
A	PRELIMINARY	ANM	08/14/24
B	100% CONSTRUCTION	JMH	08/30/24

ATC SITE NUMBER: 205626
ATC SITE NAME: HWY 40 AND HWY 131
AT&T MOBILITY SITE NUMBER:
SICO001592
AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131
SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487



08/30/24



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

TOWER ELEVATION

SHEET NUMBER:	REVISION:
C-201	0

EXISTING CONFIGURATIONS ARE BASED ON RFDS.
CONTRACTOR TO VERIFY EXISTING CONDITIONS.

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FOR
CODE
COMPLIANCE
09/16/2024

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A SEPARATE PROJECT. CONSTRUCTION IS NOT
TO PROCEED UNTIL THE MOUNT ANALYSIS IS
COMPLETE AND INDICATES THE ADDITIONAL
LOADING DOES NOT OVERSTRESS THE MOUNT.



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SEAL:



08/30/24



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

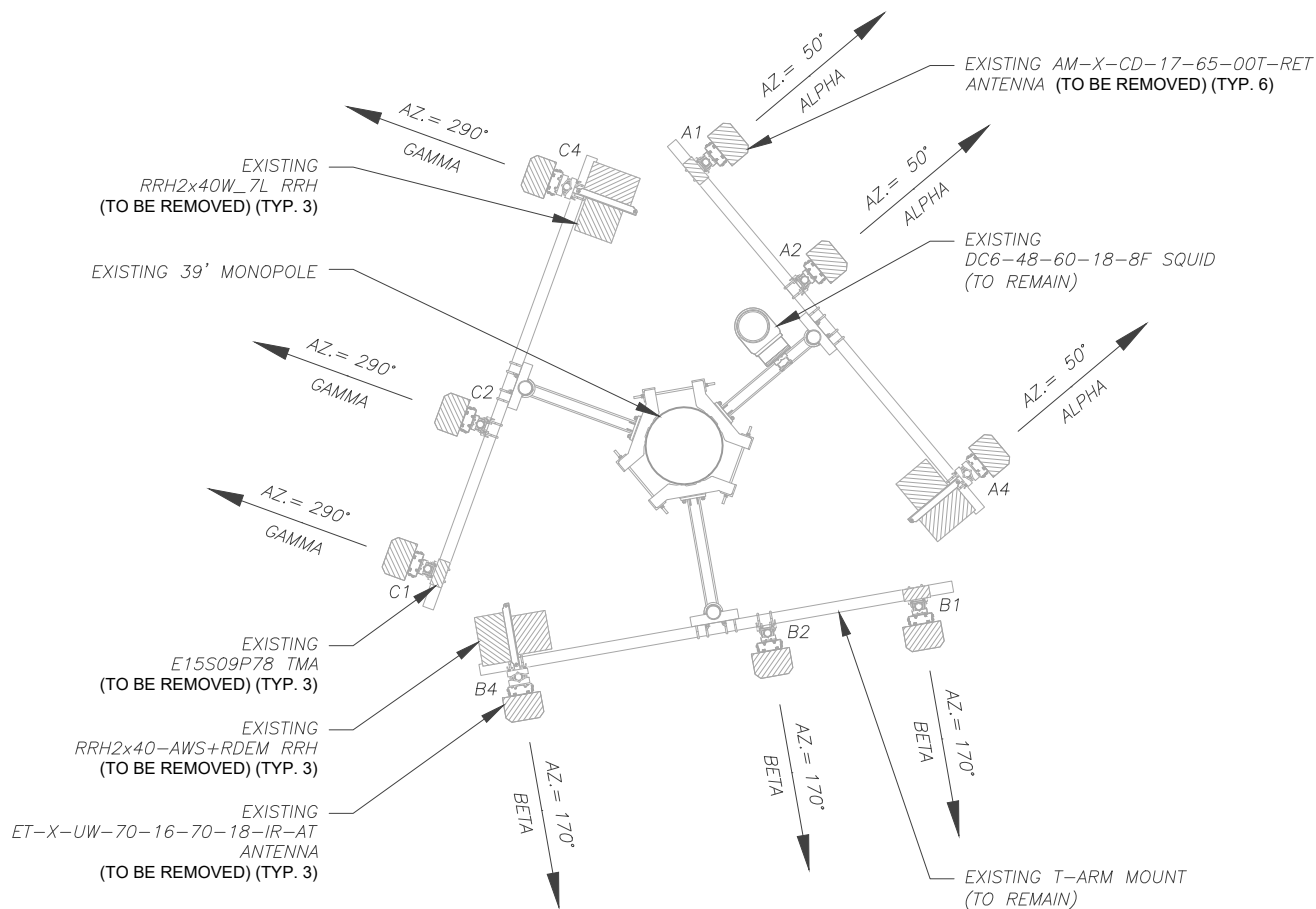
ANTENNA INSTALLATION

SHEET NUMBER:

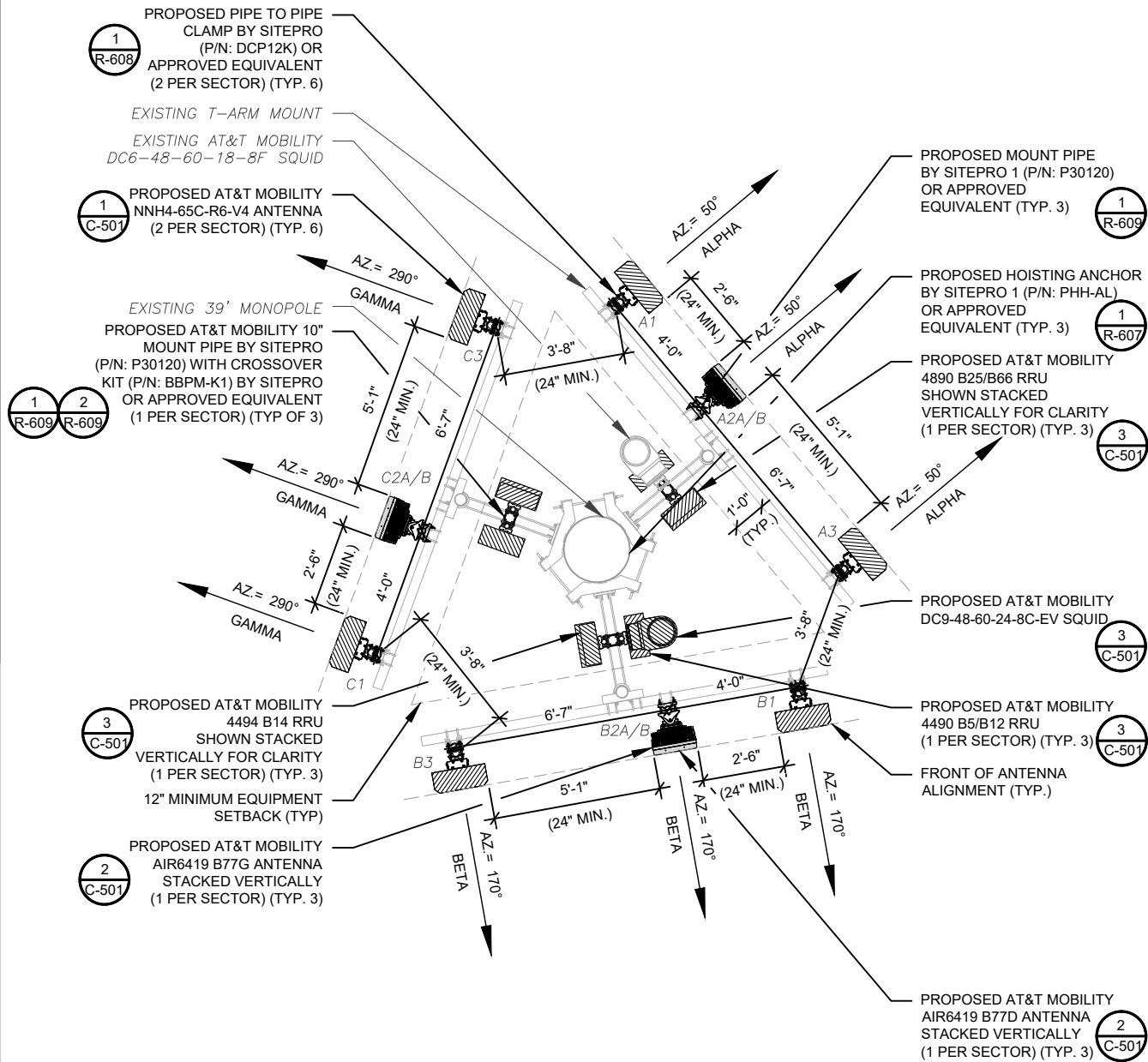
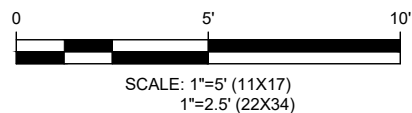
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REVISION:

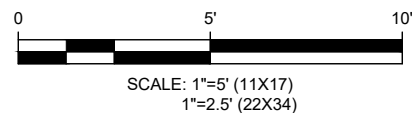
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1 EXISTING ANTENNA PLAN
SCALE: 1"=5'



2 PROPOSED ANTENNA PLAN
SCALE: 1"=5'



PROPOSED RRUs MUST BE
INSTALLED A MINIMUM OF 12"
AWAY FROM ALL ANTENNAS

REVIEWED
FOR
CODE
COMPLIANCE
09/16/2024

EXISTING ANTENNA SCHEDULE								
LOCATION			ANTENNA SUMMARY			NON ANTENNA SUMMARY		
SECTOR	RAD	AZ	POS	ANTENNA	BAND	STATUS	ADDITIONAL TOWER MOUNTED EQUIPMENT	STATUS
ALPHA	36'	56°	A1	AM-X-CD-17-65- 00T-RET	UMTS 1900	RMV	(1) E15S09P78	RMV
			A2	AM-X-CD-17-65- 00T-RET	LTE AWS	RMV	—	—
			A3	ET-X-UW-70-16-70-18-IR-AT	LTE 700/LTE AWS	RMV	(1) RRH2x40W_7L (1) RRH2x40-AWS+RDEM	RMV RMV
BETA	36'	170°	B1	AM-X-CD-17-65- 00T-RET	UMTS 1900	RMV	(1) E15S09P78	RMV
			B2	AM-X-CD-17-65- 00T-RET	LTE AWS	RMV	—	—
			B3	ET-X-UW-70-16-70-18-IR-AT	LTE 700/LTE AWS	RMV	(1) RRH2x40W_7L (1) RRH2x40-AWS+RDEM	RMV RMV
GAMMA	36'	290°	C1	AM-X-CD-17-65- 00T-RET	UMTS 1900	RMV	(1) E15S09P78	RMV
			C2	AM-X-CD-17-65- 00T-RET	LTE AWS	RMV	—	—
			C3	ET-X-UW-70-16-70-18-IR-AT	LTE 700/LTE AWS	RMV	(1) RRH2x40W_7L (1) RRH2x40-AWS+RDEM	RMV RMV

NOTES

1. GC TO VERIFY THE FINAL RFDS MATCHES THE FINAL CONSTRUCTION DRAWINGS. GC TO NOTIFY ATC PM OF ANY DISCREPANCY PRIOR TO INSTALLING THE EQUIPMENT.

2. GC TO CAP ALL UNUSED PORTS.

3. CONFIRM SPACING OF PROPOSED EQUIP DOES NOT CAUSE TOWER CONFLICTS NOR IMPEDE TOWER CLIMBING PEGS.

4. THE ANTENNA ORIENTATION PLAN IS A SCHEMATIC. ATC DID NOT CONFIRM EXISTING SITE CONDITIONS INCLUDING, BUT NOT LIMITED TO, ANTENNA AZIMUTHS, MOUNT CONFIGURATIONS AND TOWER ORIENTATION. SCALES SHOWN ARE FOR REFERENCE ONLY AND EXISTING DIMENSIONS ARE APPROXIMATE. THE CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS PRIOR TO INSTALLATION AND NOTIFY ATC OF ANY DISCREPANCIES.

5. CONTRACTOR TO ENSURE PROPER SEPARATION IN ACCORDANCE WITH AT&T'S FIRSTNET REQUIREMENTS

STATUS ABBREVIATIONS

RMV: TO BE REMOVED
RMN: TO REMAIN
REL: TO BE RELOCATED
ADD: TO BE ADDED

CABLE LENGTHS FOR JUMPERS

JUNCTION BOX TO RRU: 15'
RRU TO ANTENNA: 10'

FINAL ANTENNA SCHEDULE									
LOCATION			ANTENNA SUMMARY				NON ANTENNA SUMMARY		
SECTOR	RAD	AZ	POS	ANTENNA	BAND	STATUS	ADDITIONAL TOWER MOUNTED EQUIPMENT	STATUS	
ALPHA	36'-0"	50°	A1	NNH4-65C-R6-V4	-	ADD	(1) 4490 B5/B12A	ADD	
	38'-0"		A2A	AIR6419 B77D	5G CBAND	ADD	-	-	
	34'-0"		A2B	AIR6419 B77G	5G DOD	ADD			
	36'-0"	170°	A3	NNH4-65C-R6-V4	-	ADD	(1) 4494 B14 (1) 4890 B25/B66	ADD ADD	
BETA	36'-0"		B1	NNH4-65C-R6-V4	-	ADD	(1) 4490 B5/B12A	ADD	
	38'-0"		B2A	AIR6419 B77D	5G CBAND	ADD	-	-	
	34'-0"		B2B	AIR6419 B77G	5G DOD	ADD			
	36'-0"		B3	NNH4-65C-R6-V4	-	ADD	(1) 4494 B14 (1) 4890 B25/B66	ADD ADD	
GAMMA	36'-0"	290°	C1	NNH4-65C-R6-V4	-	ADD	(1) 4490 B5/B12A	ADD	
	38'-0"		C2A	AIR6419 B77D	5G CBAND	ADD	-	-	
	34'-0"		C2B	AIR6419 B77G	5G DOD	ADD			
	36'-0"		C3	NNH4-65C-R6-V4	-	ADD	(1) 4494 B14 (1) 4890 B25/B66	ADD ADD	

EXISTING FIBER DISTRIBUTION/SQUID			EXISTING CABLING SUMMARY			
MODEL NUMBER	STATUS	COAX//CONDUIT	DC	FIBER	STATUS	
(1) DC6-48-60-18-8F	RMN	(6) 7/8"	(2) 0.78" (19.7MM) 8 AWG 6	(1) 0.39" (10MM) TRUNK	RMN	
—	—	(2) 2" CONDUIT	—	—	RMN	

1 EQUIPMENT SCHEDULES

FINAL FIBER DISTRIBUTION/SQUID		FINAL CABLING SUMMARY			
MODEL NUMBER	STATUS	COAX//CONDUIT	DC/CONTROL	FIBER	STATUS
(1) DC6-48-60-18-8F	RMN	(6) 7/8"	(2) 0.78" (19.7MM) 8 AWG 6	(1) 0.39" (10MM) TRUNK	RMN
-	-	(2) 2" CONDUIT	-	-	RMN
(1) DC9-48-60-24-8C-EV	ADD	(2) 2" CONDUITS	(3) 0.96" (24.3 MM) CABLE 6 AWG 8	-	ADD



PLANS PREPARED BY:



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REV.	DESCRIPTION	BY	DATE
A	PRELIMINARY	ANM	08/14/24
B	100% CONSTRUCTION	JMH	08/30/24
C			
D			
E			

ATC SITE NUMBER: 205626

ATC SITE NAME: HWY 40 AND HWY 131

AT&T MOBILITY SITE NUMBER:
SICO001592

AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131

SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487

SEAL:

08/30/24

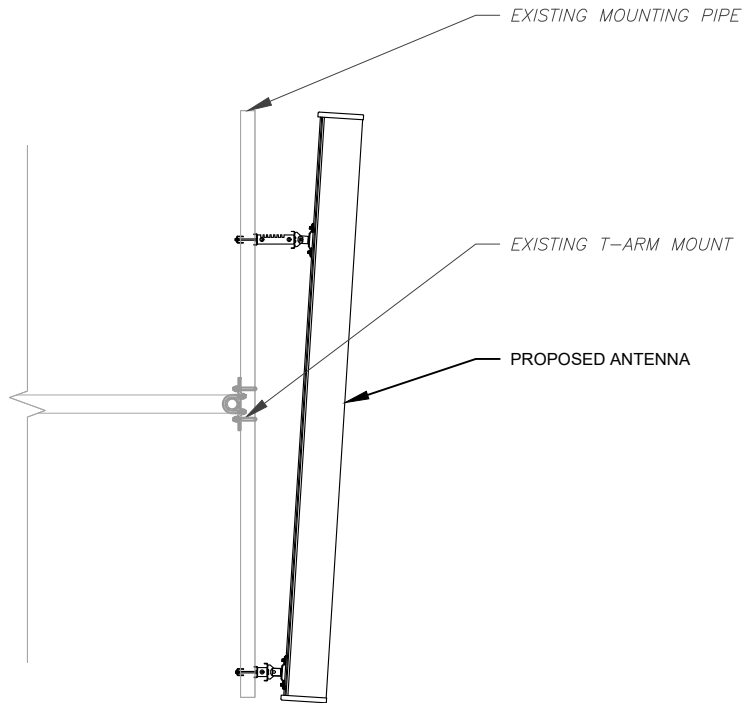


DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

ANTENNA SCHEDULE

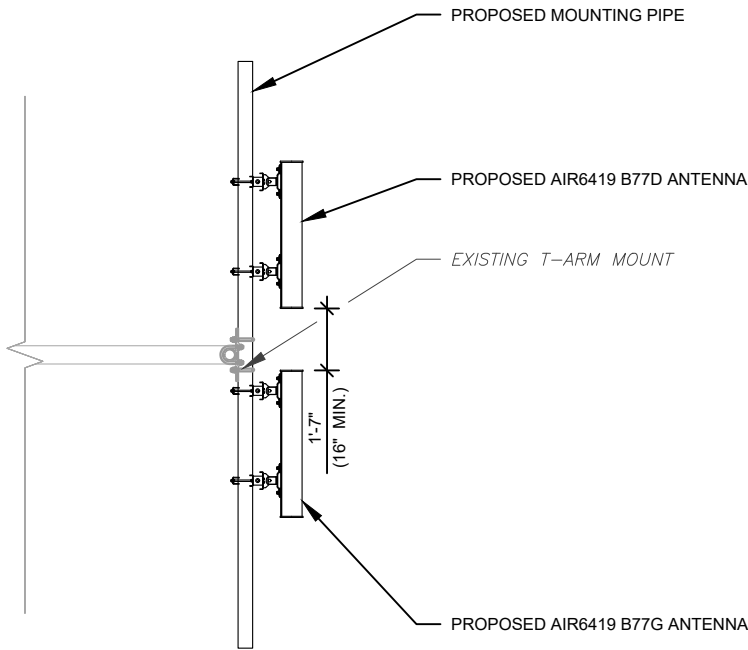
SHEET NUMBER:
C-402

REVISION:
0

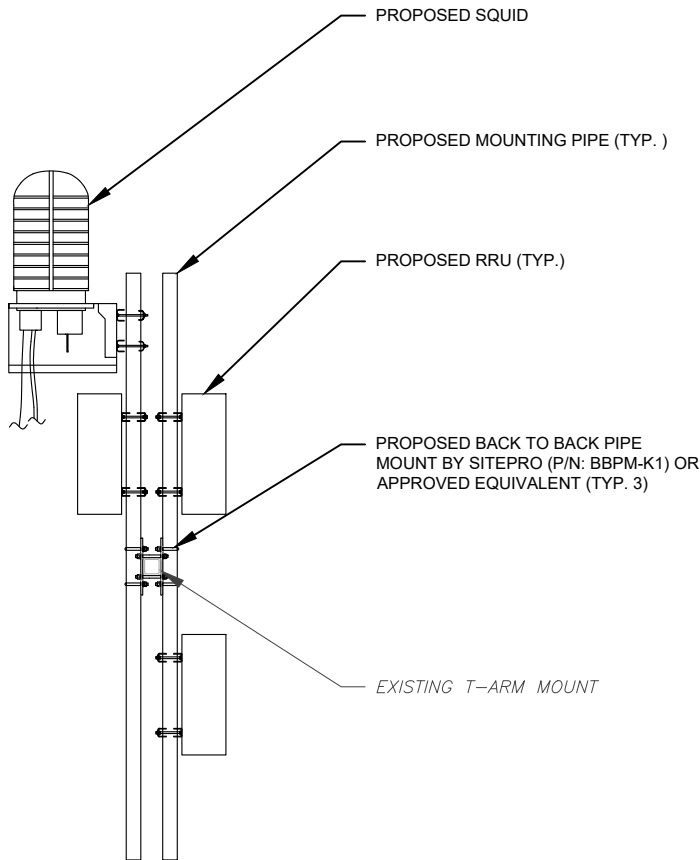


1 PROPOSED ANTENNA MOUNTING DETAIL
SCALE: N.T.S.

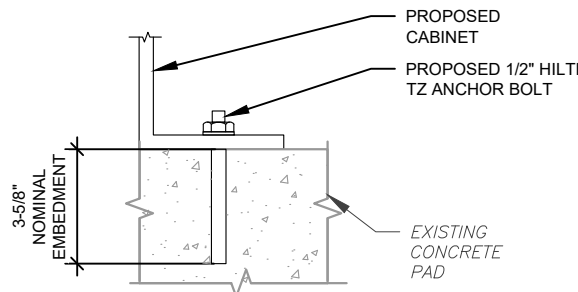
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FOR
CODE
COMPLIANCE
09/16/2024



2 PROPOSED 5G ANTENNA MOUNTING DETAIL
SCALE: N.T.S.



3 PROPOSED RRU / SQUID MOUNTING DETAIL
SCALE: N.T.S.



NOTE:

1. INSTALL HILTI TZ ANCHORS STRICTLY PER INSTALLATION INSTRUCTIONS INCLUDED WITH PRODUCT OR FOUND ONLINE AT WWW.US.HILTI.COM. PROPER INSTALLATION IS CRITICAL FOR FULL PERFORMANCE.

4 PROPOSED CABINET ATTACHMENT DETAIL
SCALE: N.T.S.



PLANS PREPARED BY:

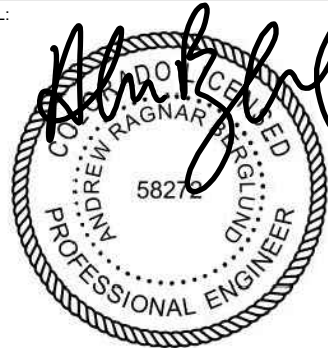


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REV.	DESCRIPTION	BY	DATE
A	PRELIMINARY	ANM	08/14/24
0	100% CONSTRUCTION	JMH	08/30/24

ATC SITE NUMBER: 205626
ATC SITE NAME: HWY 40 AND HWY 131
AT&T MOBILITY SITE NUMBER:
SICO001592
AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131
SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487

SEAL:



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

CONSTRUCTION
DETAILS

SHEET NUMBER:	REVISION:
C-501	0

AC POWER PANEL A (EXISTING)										
120/240 VOLTS, 1-PHASE, 3-WIRE, 225A										
MAIN BREAKER RATING (A) :			200		SYSTEM VOLTAGE (V) : 240					
DESCRIPTION	VA	c/nc	BKR	POSN	L1	L2	POSN	BKR	c/nc	VA
RECTIFIER #1	150	c	30/2	1	3400		2	50/2	c	3250
	150	c		3		3400	4		c	3250
RECTIFIER #2	150	c	30/2	5	3400		6	50/2	c	3250
	150	c		7		3400	8		c	3250
RECTIFIER #3	150	nc	30/2	9	1150		10	20/1	nc	1000
	150	nc		11		800	12		nc	650
RECTIFIER #4	150	c	30/2	13	870		14	20/1	nc	720
	150	c		15		1050	16		nc	900
RECTIFIER #5	150	c	30/2	17	450		18	20/1	nc	300
	150	c		19		150	20		nc	0
RECTIFIER #6	150	c	30/2	21	150		22	30/2	nc	0
	150	c		23		150	24		nc	0
RECTIFIER #7	150	c	30/2	25	150		26	30/2	nc	0
	150	c		27		150	28			
RECTIFIER #8	150	c	30/2	29	150		30			
	150	c		31		150	32			
RECTIFIER #9	150	c	30/2	33	150		34			
	150	c		35		150	36			
RECTIFIER #10	0	nc	30/2	37	0		38			
	0	nc		39		0	40			
EXTERIOR RECEPTACLE	360	nc	20/1	41	360		42			
PHASE TOTALS (VA):					10230	9400				
PHASE TOTALS (A):					85	78				
CURRENT PER PHASE W/ 125% Continuous Loads (A):					101	94	Amperes/phase cannot exceed main breaker rating			
PANEL TOTAL (VA):					19630		Legend: c = continuous, nc = non-continuous			
PANEL TOTAL W/ 125% Continuous Loads (VA):					23480					

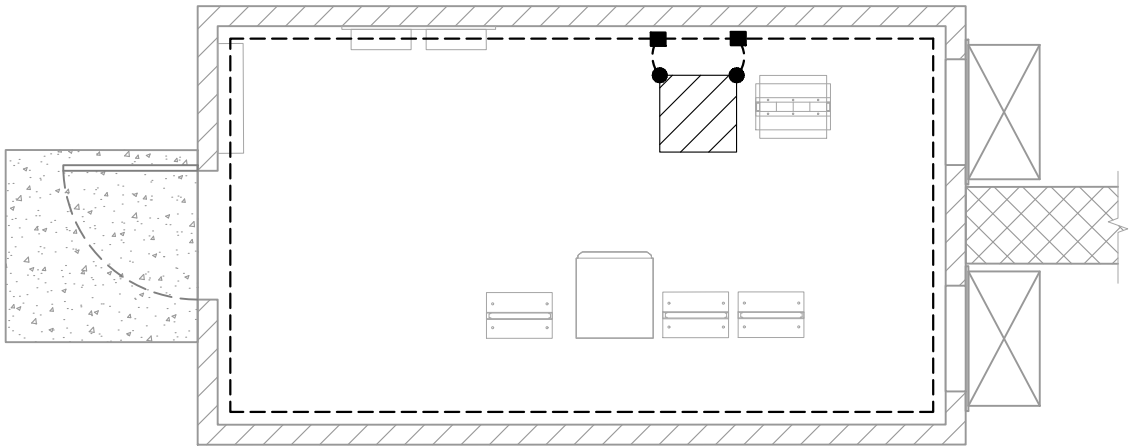
1 EXISTING PANEL SCHEDULE

SCALE: N.T.S.

AC POWER PANEL A (PROPOSED)										
120/240 VOLTS, 1-PHASE, 3-WIRE, 225A										
MAIN BREAKER RATING (A) :			200		SYSTEM VOLTAGE (V) : 240					
DESCRIPTION	VA	c/nc	BKR	POSN	L1	L2	POSN	BKR	c/nc	VA
VERTIV RECTIFIER 1 & 2	1480	c	30/2	1	4730		2	50/2	c	3250
	1480	c		3		4730	4		c	3250
VERTIV RECTIFIER 3 & 4	1480	c	30/2	5	4730		6	50/2	c	3250
	1480	c		7		4730	8		c	3250
VERTIV RECTIFIER 5 & 6	1480	nc	30/2	9	2480		10	20/1	nc	1000
	1480	nc		11		2130	12		nc	650
VERTIV RECTIFIER 7 & 8	1480	c	30/2	13	2200		14	20/1	nc	720
	1480	c		15		2380	16		nc	900
VERTIV RECTIFIER 9	740	c	30/2	17	1040		18	20/1	nc	300
	740	c		19		740	20		nc	0
SPARE / OFF	0	nc	30/2	21	0		22	30/2	nc	0
	0	nc		23		0	24		nc	0
SPARE / OFF	0	nc	30/2	25	0		26	30/2	nc	0
	0	nc		27		0	28			
SPARE / OFF	0	nc	30/2	29	0		30			
	0	nc		31		0	32			
SPARE / OFF	0	nc	30/2	33	0		34			
	0	nc		35		0	36			
SPARE / OFF	0	nc	30/2	37	0		38			
	0	nc		39		0	40			
EXTERIOR RECEPTACLE	360	nc	20/1	41	360		42			
PHASE TOTALS (VA):					15540	14710				
PHASE TOTALS (A):					130	123				
CURRENT PER PHASE W/ 125% Continuous Loads (A):					154	147	Amperes/phase cannot exceed main breaker rating			
PANEL TOTAL (VA):					30250		Legend: c = continuous, nc = non-continuous			
PANEL TOTAL W/ 125% Continuous Loads (VA):					36090					

2 PROPOSED PANEL SCHEDULE

SCALE: N.T.S.



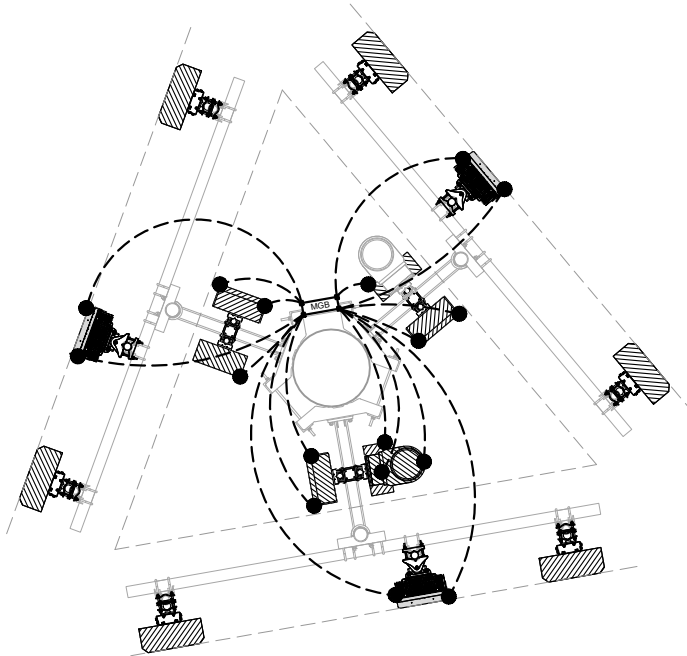
LEGEND	
■	EXOTHERMIC CONNECTION
●	MECHANICAL CONNECTION
▭	ANTENNA GROUND BAR
MGB	MASTER GROUND BAR

3 EQUIPMENT GROUNDING PLAN

SCALE: N.T.S.



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COMPLIANCE
09/16/2024



LEGEND	
■	EXOTHERMIC CONNECTION
●	MECHANICAL CONNECTION
▭	ANTENNA GROUND BAR
MGB	MASTER GROUND BAR

4 ANTENNA GROUNDING PLAN

SCALE: N.T.S.



PLANS PREPARED BY:

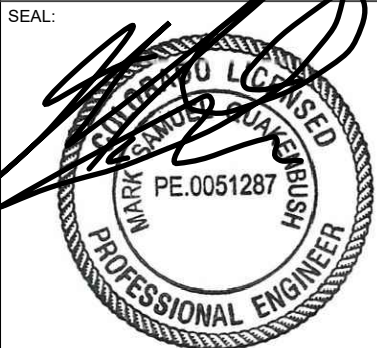


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AT&T MOBILITY SITE NUMBER:
SICO001592
AT&T MOBILITY SITE NAME:
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SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80481



08/30/24

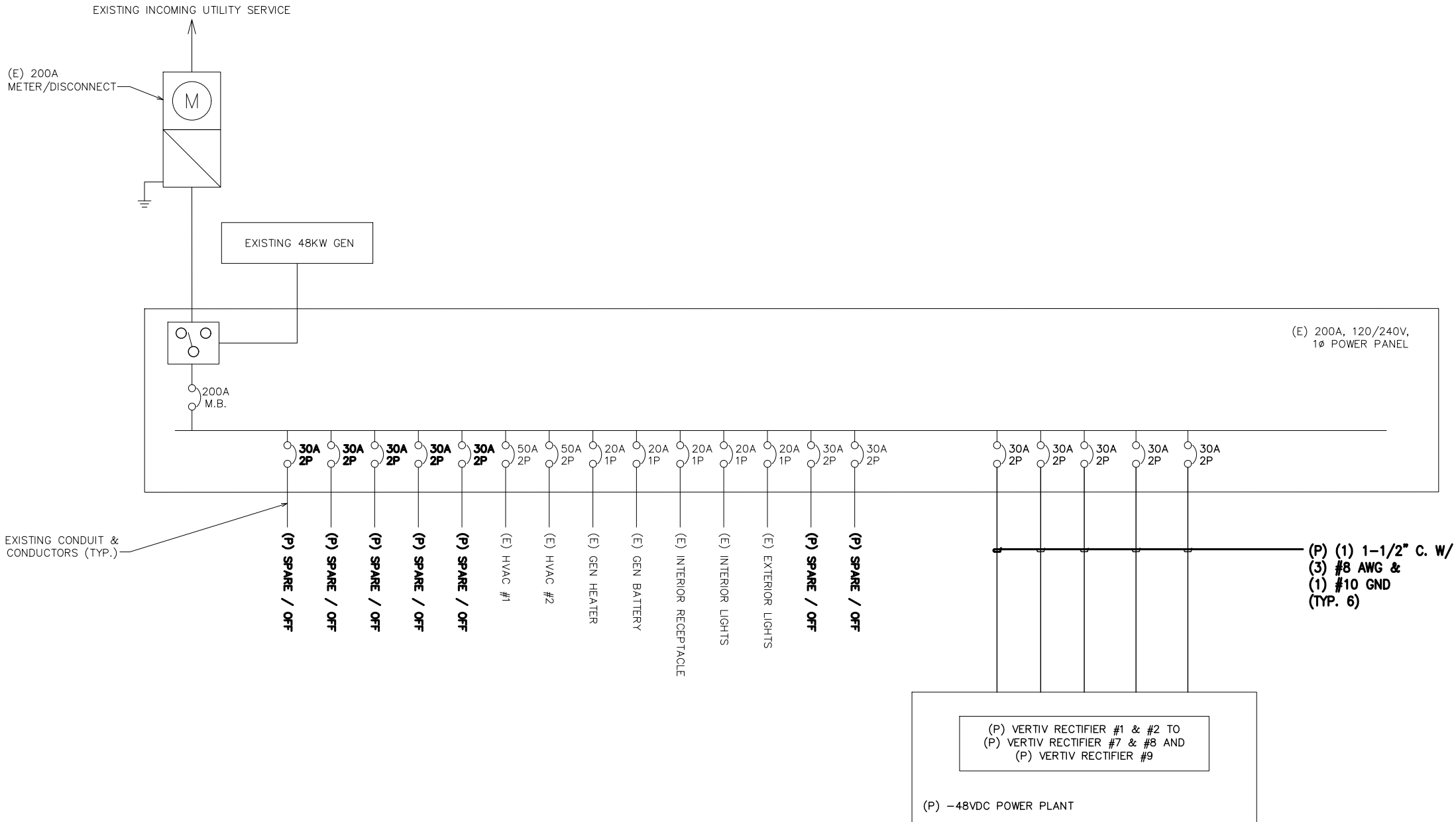


DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

ELECTRICAL DETAILS

SHEET NUMBER:	REVISION:
E-101	0

REVIEWED
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CODE
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LEGEND:
(E) - EXISTING
(P) - NEW

1 ONE-LINE DIAGRAM
SCALE: N.T.S.



PLANS PREPARED BY:

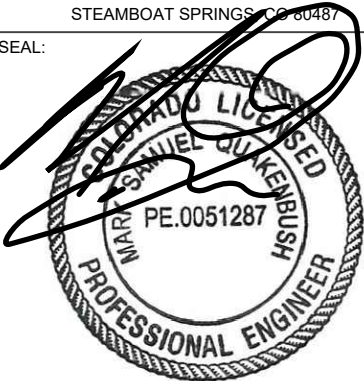


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REV.	DESCRIPTION	BY	DATE
A	PRELIMINARY	ANM	08/14/24
0	100% CONSTRUCTION	JMH	08/30/24

ATC SITE NUMBER: 205626
ATC SITE NAME: HWY 40 AND HWY 131
AT&T MOBILITY SITE NUMBER:
SICO001592
AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131
SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487

SEAL:



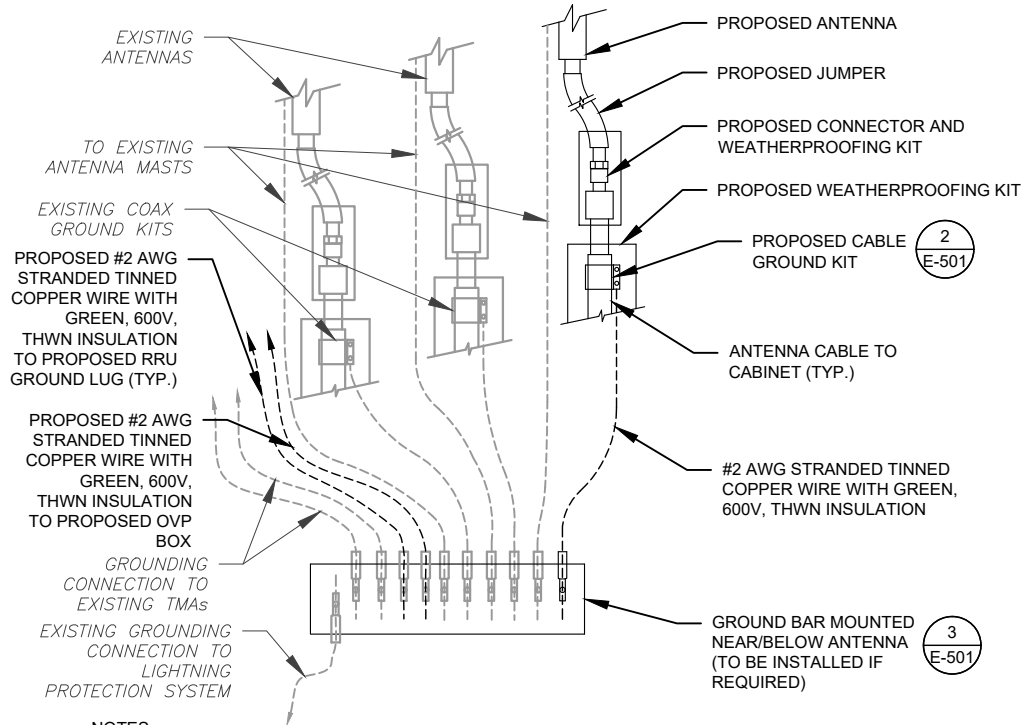
08/30/24



DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

ELECTRICAL DETAILS

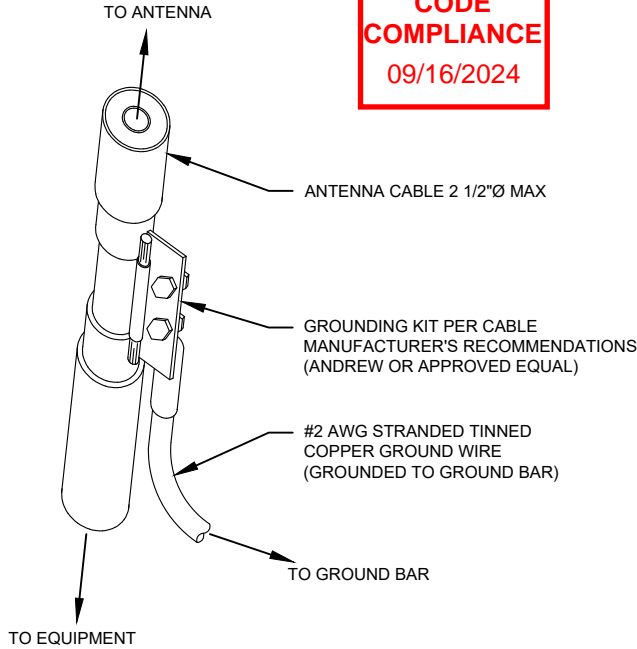
SHEET NUMBER:	REVISION:
E-102	0



NOTES:

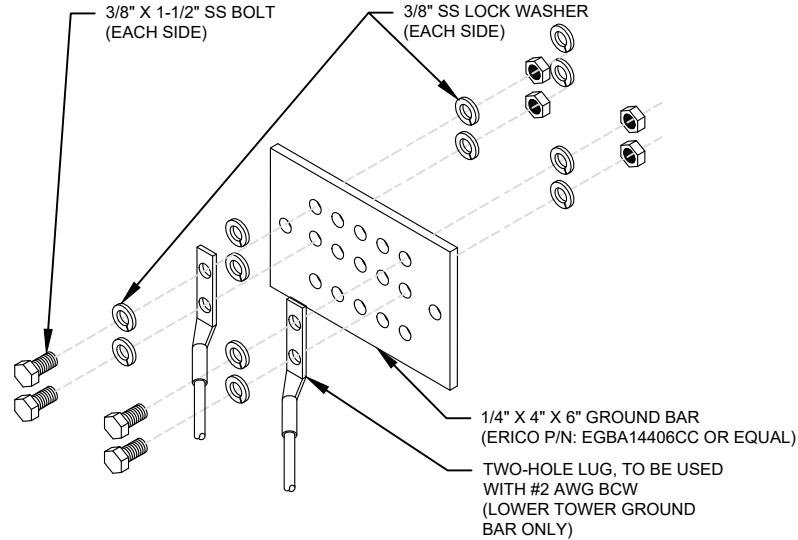
1. THIS DETAIL IS INTENDED TO SHOW THE GENERAL GROUNDING REQUIREMENTS. SLIGHT ADJUSTMENTS MAY BE REQUIRED BASED ON EXISTING SITE CONDITIONS. THE CONTRACTOR SHALL MAKE FIELD ADJUSTMENTS AS NEEDED AND INFORM THE CONSTRUCTION MANAGER OF ANY CONFLICTS.
2. SITE GROUNDING SHALL COMPLY WITH AT&T MOBILITY GROUNDING STANDARDS, LATEST EDITION, AND COMPLY WITH AT&T MOBILITY GROUNDING CHECKLIST, LATEST VERSION. WHEN NATIONAL AND LOCAL GROUNDING CODES ARE MORE STRINGENT THEY SHALL GOVERN.

1 TYPICAL ANTENNA GROUNDING DIAGRAM
SCALE: N.T.S.



- GROUND KIT NOTES:
1. DO NOT INSTALL CABLE GROUND KIT AT A BEND AND ALWAYS DIRECT GROUND WIRE DOWN TO GROUND BAR.
 2. CONTRACTOR SHALL PROVIDE WEATHERPROOFING KIT (ANDREW PART NUMBER 221213) AND INSTALL/TAPE PER MANUFACTURER'S SPECIFICATIONS.

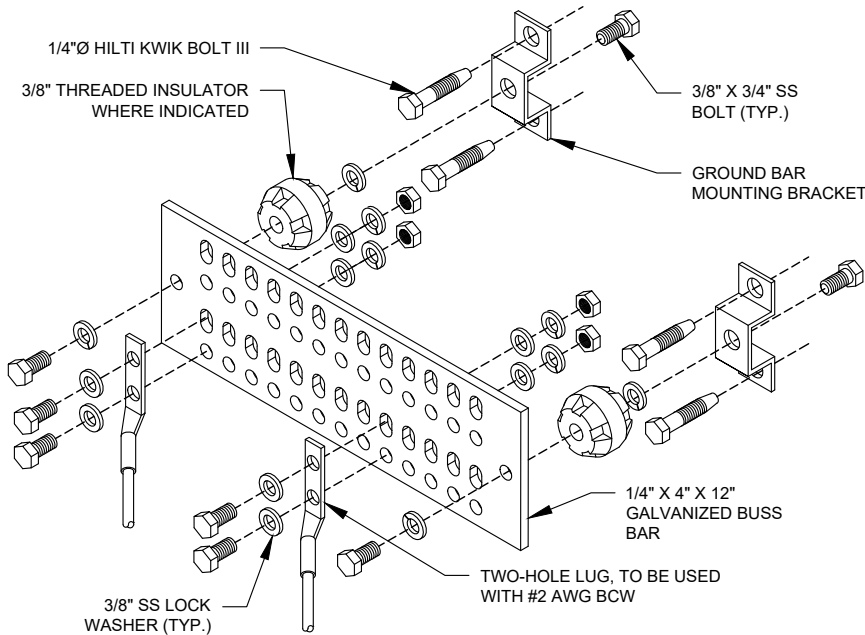
2 CABLE GROUND KIT CONNECTION DETAIL
SCALE: N.T.S.



GROUND BAR NOTES:

1. GROUND BAR KITS COME WITH ALL HARDWARE, NUTS, BOLTS, WASHERS, ETC. EXCEPT THE STRUCTURAL MOUNTING MEMBER(S).
2. GROUND BAR TO BE BONDED DIRECTLY TO TOWER.

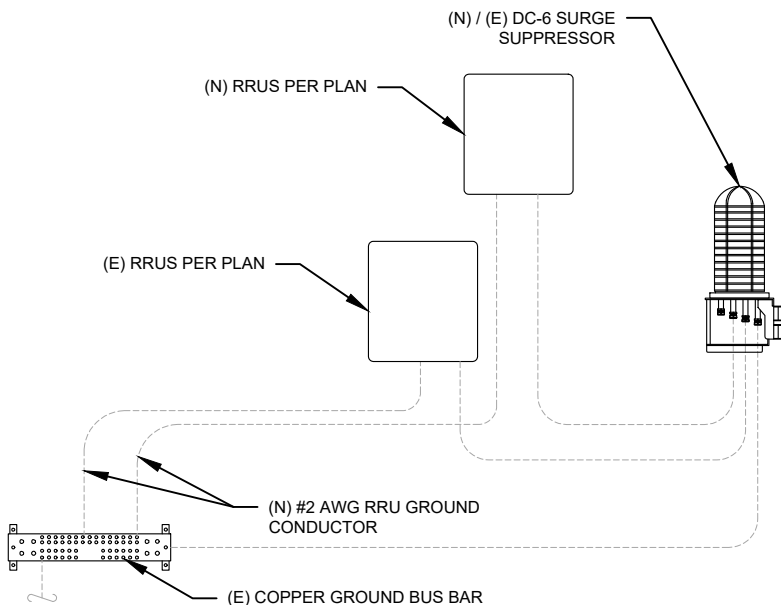
3 TOWER GROUND BAR DETAIL
SCALE: N.T.S.



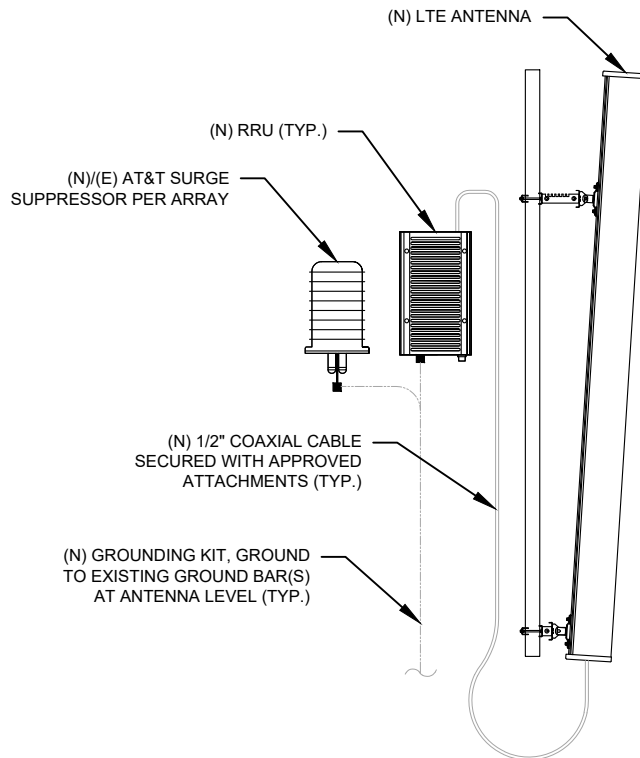
GROUND BAR NOTES

1. GROUND KITS COME WITH ALL HARDWARE, NUTS, BOLTS, WASHERS, ETC. EXCEPT THE STRUCTURAL MOUNTING MEMBER(S).
2. GROUND BAR SHALL BE BOLTED TO STRUCTURAL MEMBER OR ANCHORED TO CONCRETE SLAB W/ HILTI KWIK BOLT III.

4 MAIN GROUND BAR DETAIL
SCALE: N.T.S.



5 RRU GROUNDING
SCALE: N.T.S.



6 ANTENNA/RRU GROUNDING
SCALE: N.T.S.



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SICO001592
AT&T MOBILITY SITE NAME:
HWY 40 & HWY 131
SITE ADDRESS:
30700 COUNTY RD 14B
STEAMBOAT SPRINGS, CO 80487

SEAL:



08/30/24

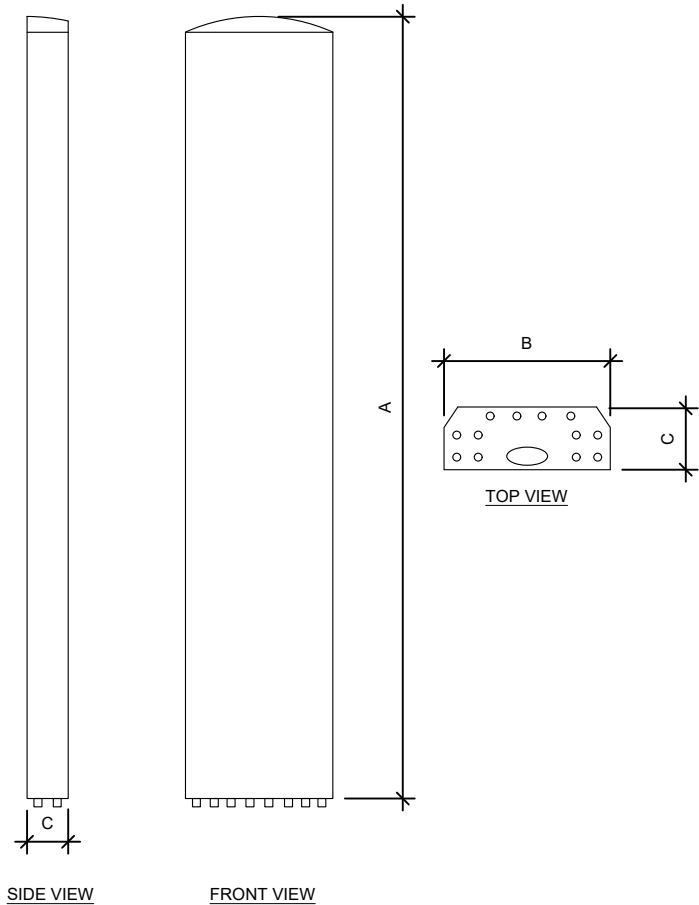


DATE DRAWN:	08/30/24
ATC JOB NO:	14758496
CUSTOMER NAME:	HWY 40 & HWY 131
CUSTOMER ID:	SICO001592

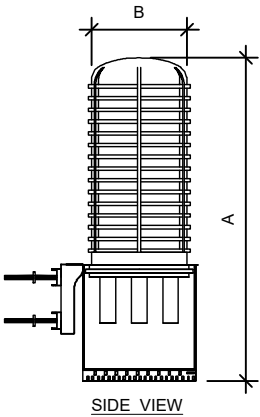
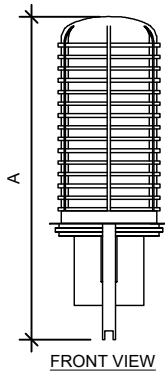
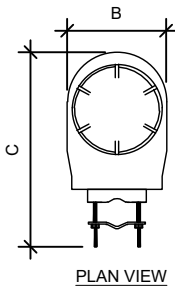
GROUNDING DETAILS

SHEET NUMBER: E-501	REVISION: 0
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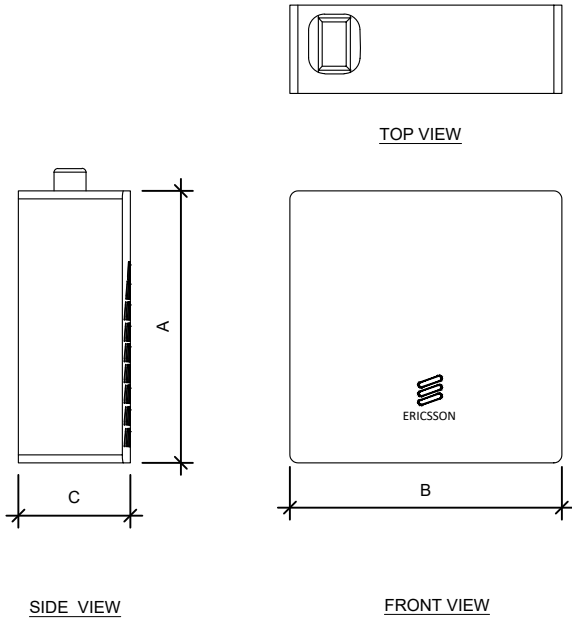
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COMPLIANCE
09/16/2024



ANTENNA SPECIFICATIONS				
ANTENNA MODEL	A	B	C	WEIGHT (LBS)
NNH4-65C-R6-V4	96"	19.6"	7.8"	93.7
AIR6419 B77G	28.3"	16.1"	7.9"	66.1
AIR6419 B77D	31.2"	16.1"	9.1"	63.1



RAYCAP SPECIFICATIONS				
RAYCAP MODEL	A	B	C	WEIGHT (LBS)
DC9-48-60-24-8C-EV	25.9"	12.4"	9.7"	18.5



RRU SPECIFICATIONS				
RRU MODEL	A	B	C	WEIGHT (LBS)
RADIO 4890 B25/B66	20.6"	15.7"	7.2"	69.5
RADIO 4478 B14	16.5"	13.4"	7.7"	59.9
RADIO 4490 B5/B12A	17.5"	15.7"	7.0"	68.4



EQUIPMENT SPECIFICATIONS

SCALE: N.T.S.

SUPPLEMENTAL

SHEET NUMBER:

R-601

REVISION:

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NETSURE™ 7100 SERIES

Stand Alone DC Power System



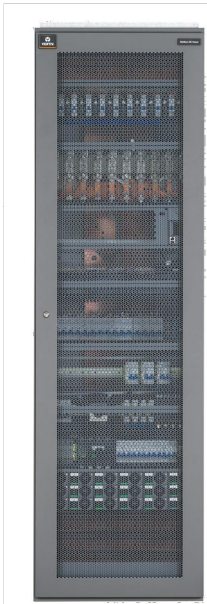
NETSURE™ 7100 SERIES

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KEY FEATURES

- Developed for ease of use, enabling safe and quick power and load adjustments on live systems
- System features world leading power density rectifiers, enabling up to 63 kW applications with plenty of distribution space, all in a single footprint
- Individual current measurement feature displays current reading for each fuse/circuit breaker
- Remote IO terminals are easily and safely accessible for adding new alarm signals
- Cabinet efficiency >99,7% from rectifier output to distribution output enabling maximum system efficiency >96,2% from grid to load
- Remote battery management and load control functions minimize the dependency of reactive site call-outs



Highly scalable DC Power system with system range from 3,5 kW to 63 kW in a single cabinet that utilize minimal space. The NetSure 7100 series delivers affordable high power density with outstanding efficiency and system reliability.

Improving reliability

Where constant migration and change is the norm

The NetSure 7100 Series of -48V DC power systems delivers outstanding reliability within a modular, scalable stand-alone cabinet. Power can be scaled in 3,5 kW increments up to 63 kW, alternative up to 21 kW with room for battery back up in the same cabinet. Distribution units can be added, swapped or removed on live sites, making system expansions a standard procedure. Power supply extensions can be made safe-and-easy, without compromising reliability.

Minimizing energy loss

Save operating costs and non-renewable resources

The NetSure 7100 Series minimizes power conversion energy losses, reducing heat dissipation and lowering energy consumption — both on the power supply and the cooling system. Cabinet infrastructure efficiency is greater than 99,7% from rectifier output to breaker output with maximum system efficiency just over 96,2% from grid to load.

Securing availability

Instead of deploying costly excess capacity up-front

With intelligent load management there is no need to install excess capacity up-front to cover for load build-ups and potential overloads. Each load can be monitored and measured down to the distribution, fuse or circuit breaker level. Our NetSure controller displays actual load current utilization in relation to fuse/circuit breaker threshold levels. Site power and load can be added incrementally, at an optimal investment pace, without compromising system reliability and power availability.

Application

The stand-alone NetSure 7100 Series is the ideal solution for small telecom central office and data center sites requiring reliability and power availability in a small footprint. This single cabinet with embedded battery backup is well suited for replacing less power efficient solutions and wherever frequent load changes require continuous monitoring of individual loads.

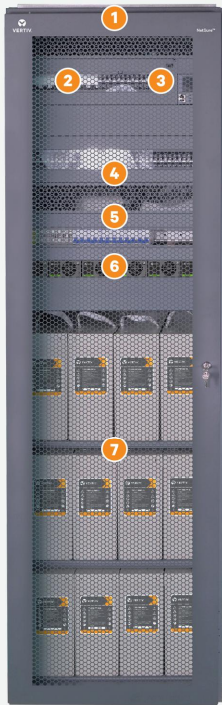
Technical Specifications

AC INPUT	
Range	Single phase: 85 VAC to 300 VAC (Nominal: 200 VAC to 240 VAC)
Line Frequency	50 or 60 Hz (45 Hz to 65 Hz)
Connections	Terminal or distribution for up to 18 circuit breakers
Surge Protection	Optional
DC OUTPUT	
Adjustable Range	-42 VDC to -58 VDC (Nominal: -48 VDC)
Power, Maximum	63 kW (18 x 3,5 kW rectifier modules)
Efficiency, Peak	96,3% eSure™ R48-3500e3 rectifier
DC SYSTEM UNITS	
Distribution Units	Available for circuit breakers, cartridge fuses, NH00 fuses, NH2 fuses
Circuit Breakers	From 2 A up to 200 A
Fuses	NH00 (up to 400 A) and NH2 (up to 400 A)
Intelligent Load Management	Optional, equipment for all distribution units
Battery Connections	4 x (300 A or 400 A) circuit breakers or fuses
Battery Shelves	Optional, up to 4 x 8 U
PHYSICAL CHARACTERISTICS	
Mounting	Top cabling
Dimensions (H x W x D)	2020 mm x 600 mm x 600 mm (per cabinet)
Weight	170 kg per cabinet (fully equipped)
Access and Security	Front access, IP20, door with lock as option
ENVIRONMENTAL	
Temperature Range, Operating	-5 °C to +60 °C (full power up to +40 °C)
Relative Humidity, Operating	<90%
Altitude	2000 m
Audible Noise	59dB for R48-3500e3
Ventilation	Forced ventilated (rectifier fans)
SAFETY AND STANDARDS COMPLIANCE	
Electrical	CE EN60950-1
EMC	EN 300 386-2, Class B
Environmental	REACH, RoHS 6

Ordering Information

MODEL NUMBER	PART NUMBER	DESCRIPTION
—	BMK220A11	Stand Alone NetSure 7100 DC power system, 42 kW
—	BMK220A12	Stand Alone NetSure 7100 DC power system, 63 kW
1R483500E3	BML440068/1	3,5 kW eSure rectifier, high efficiency
M830D	BMP903100/2	NetSure control unit (2 x 2 U front)

OVERVIEW



NetSure 7100 Stand Alone Cabinet

- Screen Door
- Battery Connection Unit
- NetSure Control Unit
- Load Distribution Unit
- AC Distribution Unit
- eSure Rectifiers
- Battery Shelves

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EN328DRD-NS7100S / August 2018

1

PROPOSED NETSURE 7100 POWER PLANT DETAIL

SCALE: N.T.S.

NOTE: THIS SHEET WAS CREATED BY OTHERS AND PROVIDED AT THE REQUEST OF CUSTOMER WITHOUT EDIT.

SUPPLEMENTAL

SHEET NUMBER:

R-602

REVISION:

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eSure™ Rectifier
R48-2000e3



eSure™ Rectifier

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Benefits

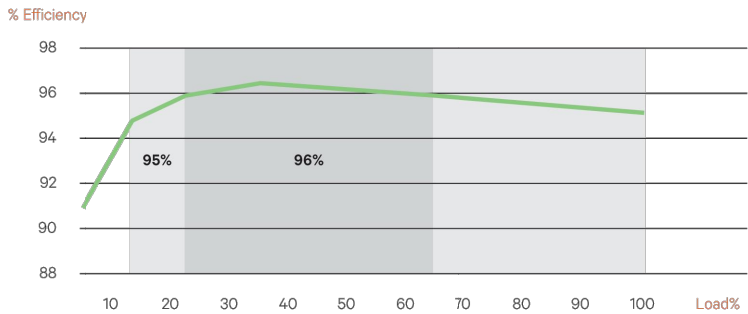
- Optimize the amount of energy delivered and reduce power consumption with over 96% efficiency.
- Increase space for revenue generating equipment with modules that pack more power in a small space with high power density.
- Facilitate easy maintenance, expansion and system changes with hot swappable capabilities.
- Enjoy increased reliability and active load sharing with Digital Signal Processing (DSP) which translates into fewer components and optimized operation.
- Appreciate the flexibility to utilize in a variety of applications with a wide input voltage range of 85 VAC to 300 VAC and full power output at temperatures from -40°C to +65°C.

In addition to reducing power consumption and lowering operating cost, eSure™ high-efficiency rectifiers offer superior performance and uncompromised reliability.

Description

The 2000 watt high-efficiency eSure rectifier (model R48-2000e3) converts standard AC supply voltages into stable nominal -48 VDC voltage that is adjustable to application needs. This constant power rectifier designed with the latest patented switch-mode technology, uses DSP (Digital Signal Processing) for efficient operation.

The R48-2000e3 can be connected in parallel with other rectifiers and converters to support a variety of telecom applications. Unified remote management and control of the power system is enabled when combined with a Vertiv™ controller.



R48-2000e3 Efficiency Curve at 250 VAC Nominal

Technical Specifications

AC Input	R48-2000E3
Voltage	85 VAC to 300 VAC (see figure 1), 187 VAC to 264 VAC (nominal)
Frequency	45 Hz to 65 Hz
Maximum Current	12 A
Power Factor	>0.99 from 50 to 100% load
Protection	High and low voltage protection, surge and lightning protection Adapts to poor quality grid (voltage dip, weak mains) Disconnection at 415 VAC Mains fuses in both lines
DC Output	
Voltage	-42 VDC to -58 VDC
Maximum Power	2000 W
Maximum Current	42 A @ -48 VDC, limit set point 0 to 42 A (see figure 2)
Peak Efficiency	96.2%
Protection	Fuse for reverse connection and back feeding protection High voltage shutdown High temperature protection
Control and Monitoring	
Converter Alarm and Signaling	Alarm and status reported via CAN bus to system controller
Visual Indications	Green LED: Normal Operation Yellow LED: Alarm Red LED: Failure
Environmental	
Operating	-40°C to 80°C / -40°F to +176°F (see figure 3 for derating)
Temperature Derating	Full output power up to +65°C at input voltage range 200 to 250 VAC (see figure 3)
Storage	-40°C to +70°C / -40°F to +158°F
Relative Humidity	0 to 95%
Altitude	Full output power up to +65°C at input voltage range @200~ 250 VAC
Standards Compliance	
Safety	60950-1 (EN, IEC and UL)
EMC	EN55022, CISPR22, ETSI EN300 286: 2005, FCC CFR 47 Part 15, Telcordia GR-1089-CORE issue 6 (Class B conducted and radiated)
Environment	REACH, RoHS, WEEE
Mechanics	
Dimensions (H x W x D)	41 x 84.5 x 252.5 (mm) / 1.61 x 3.33 x 9.94 (inches)
Weight	1.13 kg / 2.49 lbs

Ordering Information

Model Number	Description
1R482000E3	eSure™ rectifier, -48 VDC, 2000 W

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R48-2000E3 (R06/20)

Figures

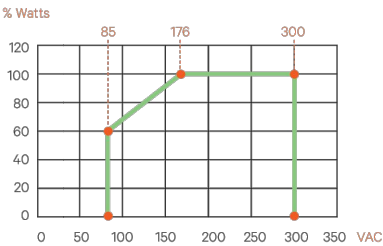


Figure 1: Output Power vs. Input Voltage and Vo > 48 V at Tamb <55°C

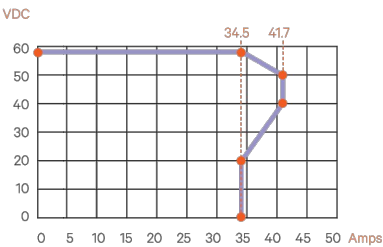


Figure 2: Output Voltage vs. Output Current at Maximum Output Power 2000 W

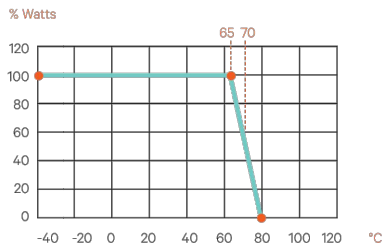


Figure 3: Output Power vs. Temperature at Uin > 200VAC

SUPPLEMENTAL

SHEET NUMBER:

R-603

REVISION:

-

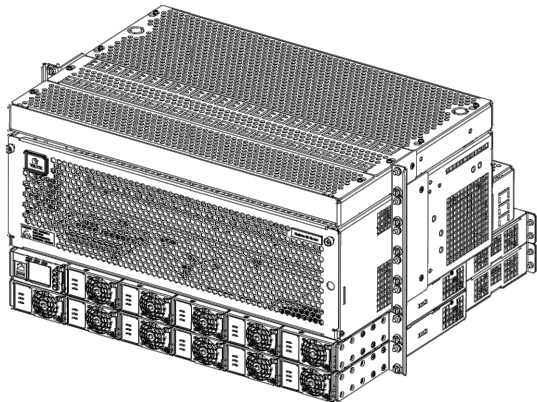
Vertiv™ NetSure™ DCS48/58-600 Converter System
System Application Guide



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SYSTEM OVERVIEW

Description: -48 VDC to -58 VDC @ up to 600 Amperes Converter System
The Vertiv™ NetSure™ DCS48/58-600 Converter System is a complete integrated converter system containing -48 VDC to -58 VDC converters, intelligent control, metering, monitoring, and distribution. The converter system is designed for operation with the positive output grounded.



This system consists of the following components.

- DC Distribution Cabinet**
The base system includes one (1) distribution cabinet, which provides DC distribution through fuses and/or circuit breakers. The distribution cabinet can be equipped either with a 1-row, 26-position bullet nose type circuit breaker and TPS/TLS fuseholder distribution panel or a distribution panel equipped with four (4) GJ/218 type circuit breaker positions. The distribution cabinet may be equipped with a load disconnect contactor.
A field installed only expansion distribution cabinet is available which provides DC distribution through fuses and/or circuit breakers. The expansion distribution cabinet is equipped with a 1-row, 26-position bullet nose type circuit breaker and TPS/TLS fuseholder distribution panel. The expansion distribution cabinet may be equipped with a load disconnect contactor.
- Controller**
NCU (NetSure™ Control Unit) Controller: The NCU controller provides power system control, converter module control, metering functions, monitoring functions, local/remote alarm functions, and connections for binary inputs and programmable relay outputs. The system also accepts up to two (2) temperature probes to monitor ambient and/or battery temperature. The controller also provides data acquisition and system alarm management. The controller contains a color TFT display and keypad for local access. The controller provides an Ethernet port and comes with comprehensive webpages for local/remote access. The controller has SNMP V3 capability for remote system management. The controller supports software upgrade via its USB port. Refer to the NCU Controller Instructions (UM1M830BNA) for more information.
- Converter Module Mounting Shelf (Spec. No. 588705300)**
The system contains two (2) Spec. No. 588705300 converter module mounting shelves, each of which houses the converter modules. The top converter module mounting shelf also houses the NCU controller.
A field installed only expansion converter module mounting shelf is available. Up to two (2) expansion converter module mounting shelves can be installed in an existing system.
- 48 VDC to -58 VDC Converter Modules**
The system accepts 2000 watt peak, 1600 watt average converter modules to provide -58 VDC load power. Refer to the Converter Instructions (UM1C48582000P3) for more information.

Vertiv™ NetSure™ DCS48/58-600 Converter System
System Application Guide

General Converter Systems Specifications

See detailed specifications on page 41.

Family:	NetSure™
Spec. No.:	584641000
Model:	DCS48/58-600
DC Input Voltage:	Nominal -48 VDC (-41 VDC to -58.5 VDC).
DC Output Voltage:	Nominal -57 VDC, positive ground. Output voltage is adjustable from -56.0 VDC to -58.0 VDC via the system controller.
DC Output Capacity:	600 A, maximum
1C48582000P3 Converter Rating:	See UM1C48582000P3.
Agency Approval:	UL Listed to UL/CSA 62368-1 (cULus), Meets NEBS Level 1
Mounting Type:	Nominal 23" Relay Rack or Equipment Rack Mounting
Mounting Depth:	See "Overall Dimensions" on page 43.
Mounting Height:	See "Overall Dimensions" on page 43.
Access:	Front and Rear for Installation, Expansion, and Maintenance. Front for Operation.
Control:	Microprocessor
Color:	Faceplates: Textured Gray Other Surfaces: Bright Zinc
Environment:	-40 °C to +65 °C (-40 °F to +149 °F)

SUPPLEMENTAL

SHEET NUMBER:	REVISION:
R-604	-

ESURE™ CONVERTER

C48/24-1500



ESURE™ CONVERTER



KEY FEATURES

Converter, 48 to 24 VDC, 1500 W

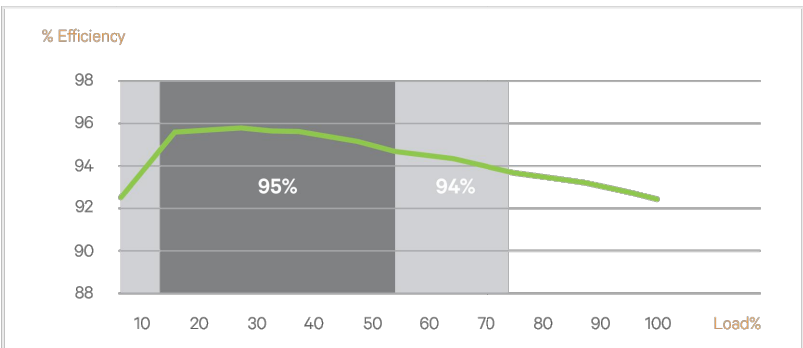
- High efficiency over 95% – reduces power consumption lowering operating costs
- High power density – provides more space for revenue generating equipment
- Hot pluggable and interchangeable – for easy expansions and maintenance
- Digital signal processing (DSP) – means fewer components, optimized operation and active load sharing for increased reliability
- Wide input voltage range (41 VDC to 58 VDC) – allows for flexibility, durability and resilience
- Wide operating temperature range from -40°C to +65° – meets the harshest climatic environment requirements
- Compliant with global standards – delivers quality, performance and reliability no matter what the application or location demands

In addition to reducing power consumption and lowering operating cost, eSure™ high-efficiency converters offer superior performance and uncompromised reliability.

Description

The eSure C48/24-1500 high-efficiency converter is designed to operate from a nominal 48 Vdc source to provide nominal 24 VDC load power, which is adjustable to application needs. This constant power converter designed with the latest patented switchmode technology, uses digital signal processing (DSP) for efficient operation.

When redundancy is critical or loads are high, multiple C48/24-1500 converters can be connected in parallel to support a variety of telecom applications. Unified remote management and control of the power system is enabled when combined with a Vertiv™ controller.



C48 24-1500 Efficiency Curve at 58 VDC Nominal

Technical Specifications

DC INPUT	
Voltage	41 VDC to 58.5 VDC
Maximum Current	39.5 A
DC OUTPUT	
Voltage	24 VDC to 28 VDC
Maximum Power	1500 W @ Vout >24 VDC
Maximum Current	63 A @ 48-24 VDC, limit set point 6.3 to 63 A (see figure 1)
Peak Efficiency	>95%
Psophometric Noise (System)	<2 mV; <32 dBmc
Temperature Derating	See figure 2
CONTROL AND MONITORING	
Rectifier Alarm and Signaling	Alarm and status reported via CAN bus to system controller
Visual Indications	Green LED: Normal Operation Yellow LED: Alarm Red LED: Failure Flashing Red LED: Fan Failure
ENVIRONMENTAL	
Operating	-40°C to +80°C / -40°F to +176°F
Storage	-40°C to +85°C / -40°F to +185°F
Relative Humidity	0 to 95%
Altitude	2000 m / 6560 ft at full power
STANDARDS COMPLIANCE	
Safety	60950 (EN, IEC and UL)
EMC	ETSI EN 300 386 class A, FCC CFR 47 Part 15 class A, Telcordia GR-1089-CORE class A
Environment	REACH, RoS, WEEE
MECHANICS	
Dimensions (H x W x D)	41 x 84.5 x 252.5 (mm) / 1.61 x 3.33 x 9.94 (inches)
Weight	1.13 kg / 2.49 lbs

Ordering Information

MODEL NUMBER	DESCRIPTION
1C48241 500	Converter, 48 to 24 VDC, 1500 W

Figures

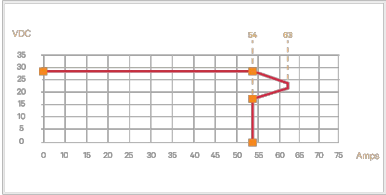


Figure 1:
Output voltage vs. Output current
at max. output power 1500 W

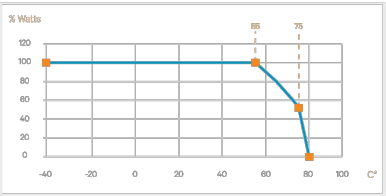


Figure 2:
Output Power vs. Temperature

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Energys Powersafe SBS 190F

Call 877.993.8855 or email: connect@alpinepowersystems.com for immediate assistance.



The Powersafe SBS 190F Front Terminal battery further extends the technical leadership of the Powersafe SBS 190F product range. Powersafe SBS 190F Front Terminal monoblocs retain the benefits of Thin Plate Pure Lead technology such as long life, high energy density superior shelf life.

Powersafe SBS 190F General Specifications:

Number Of Cells: 6
Number of Voltages: 12
Nominal Capacity:
8hr rate 1.75Vpc @ 77°F: 190

10hr rate 1.80Vpc @ 20°C: 190

Nominal Dimensions:
Length: 22.1 in, 561 mm

Width: 4.90 in, 125 mm

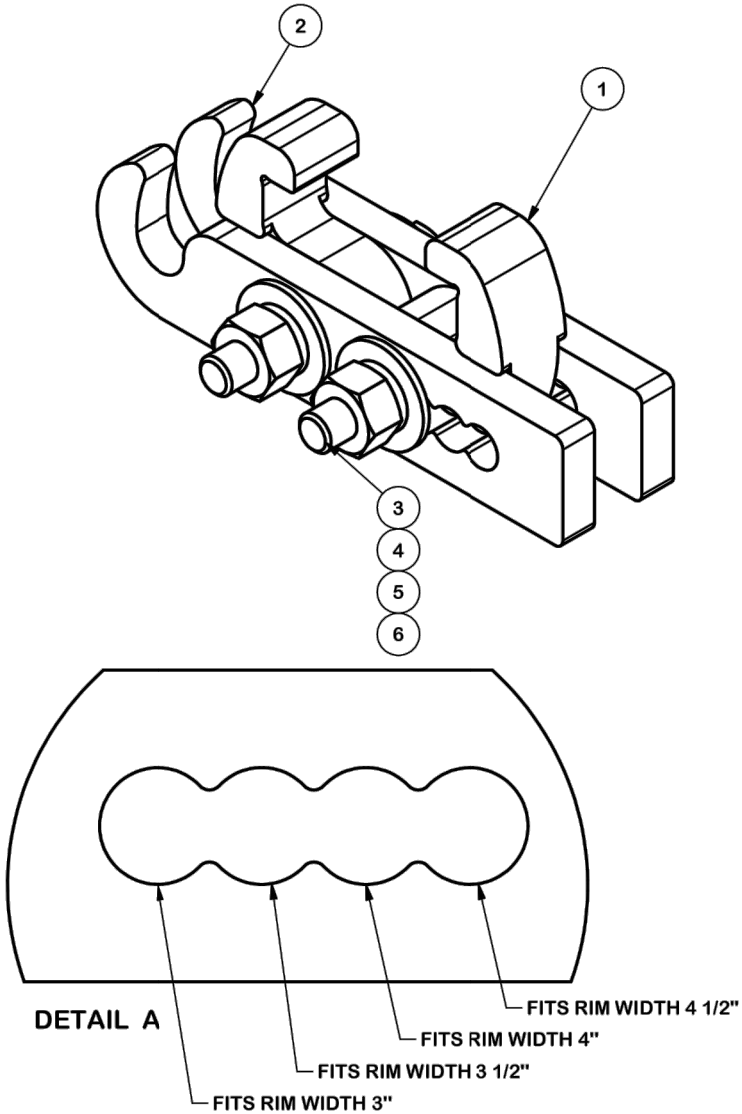
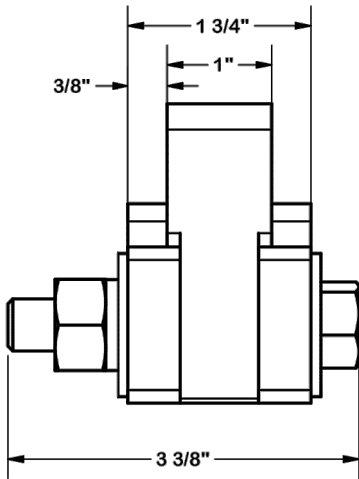
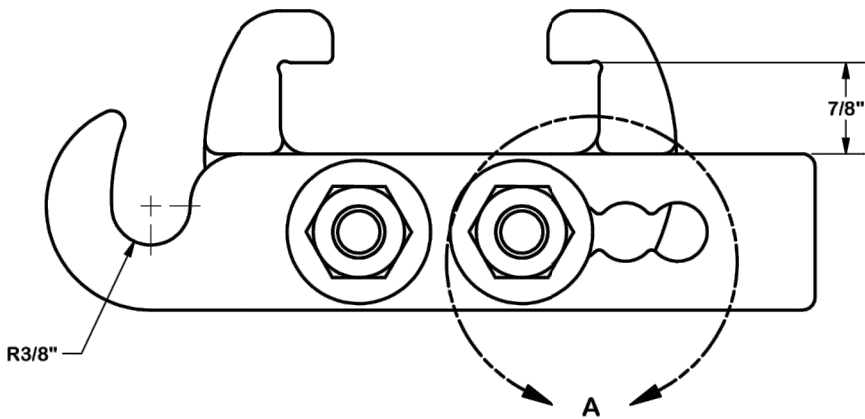
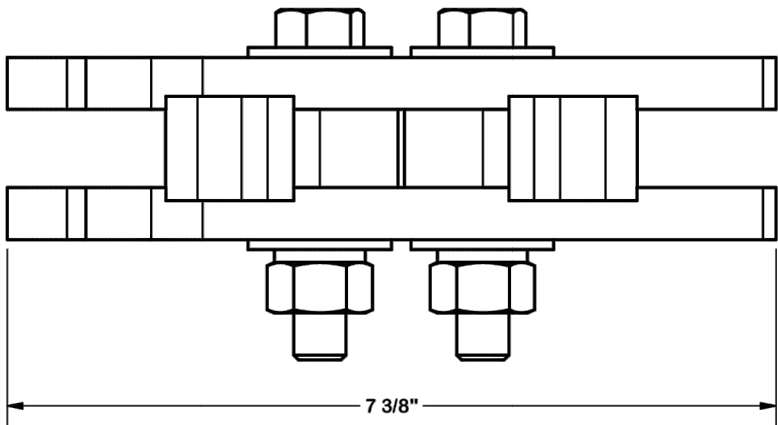
Height: 12.4 in, 316 mm

Weight: 132 lbs, 60.0 kg
Short Circuit Current (Amps): 3800
Internal Resistance: 3.30
Electrolyte:
Volume: 2.34 gal, 8.86 L

Weight: 25.3 lbs, 11.5 kg

REVIEWED
FOR
CODE
COMPLIANCE
09/16/2024

PARTS LIST						
ITEM	QTY	PART NO.	PART DESCRIPTION	LENGTH	UNIT WT.	NET WT.
1	2	X-HHR-HANGH	1" MILL PLATE (A572 GR50)	12 in	1.14	2.29
2	2	X-HHR-HANGL	1/2" MILL PLATE (A572 GR.50)	12 in	1.34	2.68
3	2	G1203	1/2" x 3" HDG HEX BOLT GR5 FULL THREAD	3 in	0.22	0.43
4	4	G12FW	1/2" HDG USS FLATWASHER	3/32 in	0.03	0.14
5	2	G12LW	1/2" HDG LOCKWASHER	1/8 in	0.01	0.03
6	2	G12NUT	1/2" HDG HEAVY 2H HEX NUT		0.07	0.14



TOLERANCE NOTES

TOLERANCES ON DIMENSIONS, UNLESS OTHERWISE NOTED ARE:
SAWED, SHEARED AND GAS CUT EDGES ($\pm 0.030"$)
DRILLED AND GAS CUT HOLES ($\pm 0.030"$) - NO CONING OF HOLES
LASER CUT EDGES AND HOLES ($\pm 0.010"$) - NO CONING OF HOLES
BENDS ARE $\pm 1/2$ DEGREE
ALL OTHER MACHINING ($\pm 0.030"$)
ALL OTHER ASSEMBLY ($\pm 0.060"$)

PROPRIETARY NOTE:
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DESCRIPTION

COAX HANGER BRACKET

CPD NO.

DRAWN BY

ENG. APPROVAL

CLASS
81

SUB
01

DRAWING USAGE
SHOP

CHECKED BY



Locations:
New York, NY
Atlanta, GA
Los Angeles, CA
Plymouth, IN
Salem, OR
Dallas, TX
Engineering
Support Team:
1-888-753-7446

PART NO.

PHH-AL

DWG. NO.

PHH-AL

PAGE
1 OF 1

1 PROPOSED SITE PRO HOISTING ANCHOR DETAIL
SCALE : N.T.S.

NOTE: THIS SHEET WAS CREATED BY OTHERS AND PROVIDED AT THE REQUEST OF CUSTOMER WITHOUT EDIT.

SUPPLEMENTAL

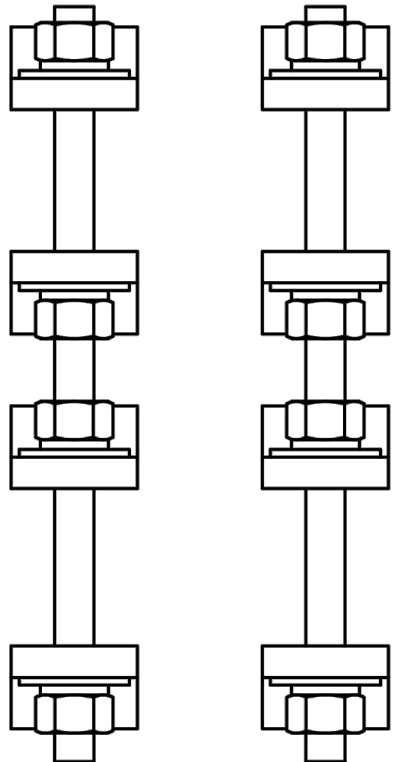
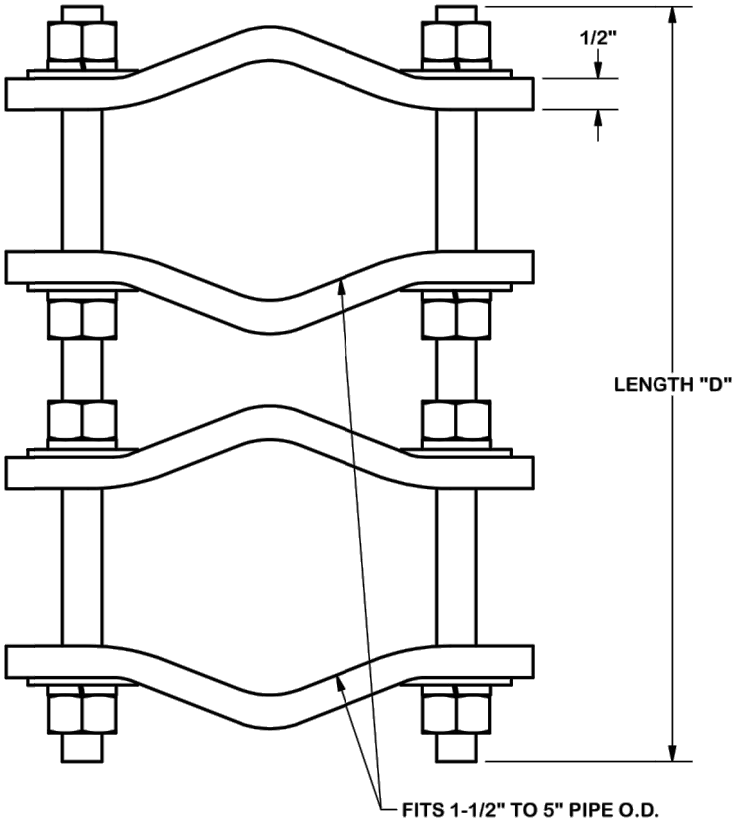
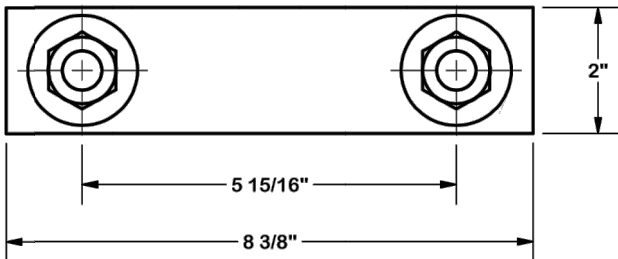
SHEET NUMBER:

R-607

REVISION:

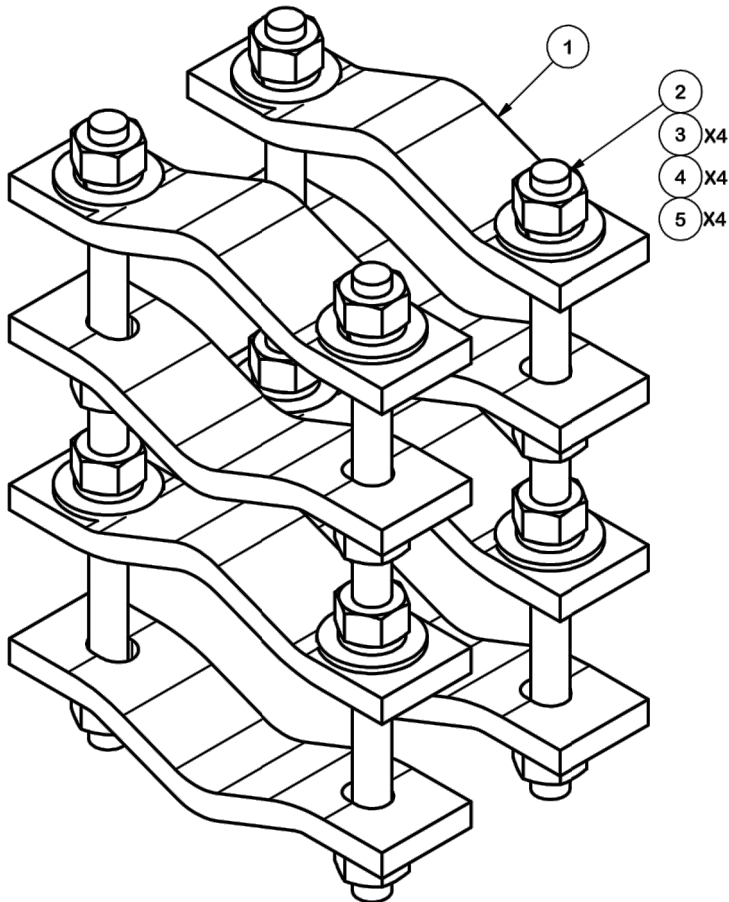
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REVIEWED
FOR
CODE
COMPLIANCE
09/16/2024



PARTS LIST						
ITEM	QTY	PART NO.	PART DESCRIPTION	LENGTH	UNIT WT.	NET WT.
1	8	DCP	CLAMP HALF, 1/2" THICK, 8-3/8"		2.40	19.20
2	B	C	5/8" THREADED ROD	D	E	F
3	16	G58NUT	5/8" HDG HEAVY 2H HEX NUT		0.13	2.08
4	16	G58LW	5/8" HDG LOCKWASHER		0.03	0.42
5	16	G58FW	5/8" HDG USS FLATWASHER		0.07	1.13

VARIABLE PARTS TABLE						
ASSEMBLY "A"	QTY "B"	PART "C"	LENGTH "D"	UNIT WT. "E"	NET WT. "F"	TOTAL WEIGHT
DCP12K	4	G58R-12	12"	1.05	4.18	27.01
DCP18K	4	G58R-18	18"	1.57	6.27	29.10



TOLERANCE NOTES

TOLERANCES ON DIMENSIONS, UNLESS OTHERWISE NOTED ARE:
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DRILLED AND GAS CUT HOLES ($\pm 0.030"$) - NO CONING OF HOLES
LASER CUT EDGES AND HOLES ($\pm 0.010"$) - NO CONING OF HOLES
BENDS ARE $\pm 1/2$ DEGREE
ALL OTHER MACHINING ($\pm 0.030"$)
ALL OTHER ASSEMBLY ($\pm 0.060"$)

PROPRIETARY NOTE:
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DESCRIPTION

PIPE TO PIPE CLAMP SET
1-1/2" TO 5" PIPE
1/2" THICK CLAMP

CPD NO.	DRAWN BY	ENG. APPROVAL
	KC8 8/21/2012	
CLASS	SUB	DRAWING USAGE
81	01	CUSTOMER



A valmont COMPANY

Engineering
Support Team:
1-888-753-7446

Locations:
New York, NY
Atlanta, GA
Los Angeles, CA
Plymouth, IN
Salem, OR
Dallas, TX

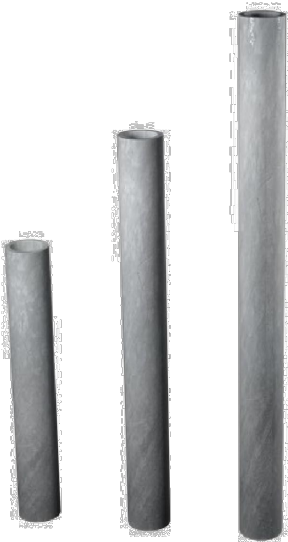
PART NO.	SEE ASSEMBLY "A"
DWG. NO.	DCPxxK

PAGE
1 OF 1

Pxxx: Bulk Pipe



Part #	Length	OD x Length (in)
Schedule 40		
P260	5'-0"	2-3/8" x 60"
P263	5'-3"	2-3/8" x 63"
P272	6'-0"	2-3/8" x 72"
P284	7'-0"	2-3/8" x 84"
P296	8'-0"	2-3/8" x 96"
P2108	9'-0"	2-3/8" x 108"
P2120	10'-0"	2-3/8" x 120"
P2126	10'-6"	2-3/8" x 126"
P2150	12'-6"	2-3/8" x 150"
P2174	14'-6"	2-3/8" x 174"
P2252	21'-0"	2-3/8" x 252"
P3072	6'-0"	2-7/8" x 72"
P3084	7'-0"	2-7/8" x 84"
P3096	8'-0"	2-7/8" x 96"
P30108	9'-0"	2-7/8" x 108"
P30120	10'-0"	2-7/8" x 120"
P30126	10'-6"	2-7/8" x 126"
P30150	12'-6"	2-7/8" x 150"
P30174	14'-6"	2-7/8" x 174"
P30252	21'-0"	2-7/8" x 252"
P360	5'-0"	3-1/2" x 60"
P372	6'-0"	3-1/2" x 72"
P384	7'-0"	3-1/2" x 84"
P396	8'-0"	3-1/2" x 96"
P3150	12'-6"	3-1/2" x 150"
P3160	13'-4"	3-1/2" x 160"
P3174	14'-6"	3-1/2" x 174"
P3216	18'-0"	3-1/2" x 216"
P3252	21'-0"	3-1/2" x 252"
P472	6'-0"	4-1/2" x 72"
P4126	10'-6"	4-1/2" x 126"
P4252	21'-0"	4-1/2" x 252"



- Features:**
- Factory cut end, hot-dip galvanized pipe
- Construction:**
- ASTM A53 Grade B
 - Schedule 40 or Schedule 80
- Design Criteria:**
- ASTM A53 Grade B (Yield Fy = 35 ksi [240 MPa]/ Tensile Fu = 60 ksi [415 MPa])
 - Hot dip galvanized in accordance with ASTM A123 requirements

Part #	Length	OD x Length (in)
Schedule 80		
P2252-80	21'	2-1/2" x 252"
P30126-80	10'-6"	2-7/8" x 126"
P30252-80	21'	2-7/8" x 252"
P3252-80	21'	3-1/2" x 252"

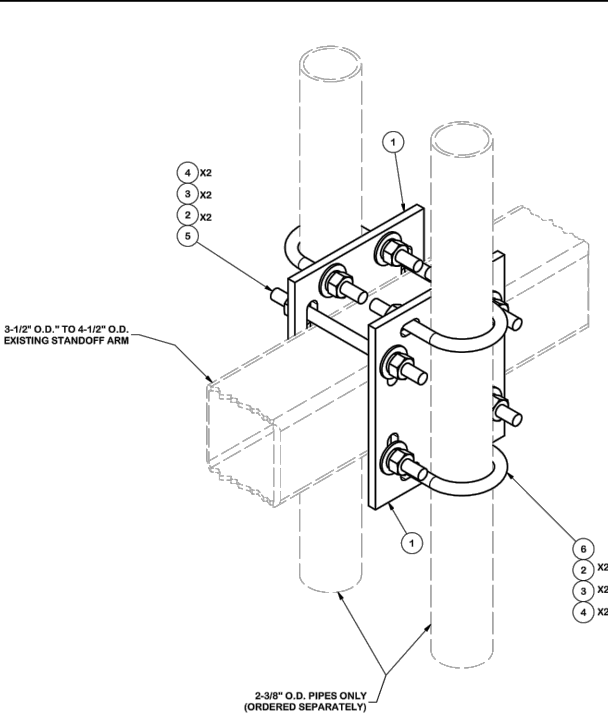
created on: 03/09/2023

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1 PROPOSED PIPE MOUNT DETAIL
SCALE: N.T.S.

REVIEWED
FOR
CODE
COMPLIANCE
09/16/2024



PARTS LIST					
ITEM	QTY	PART NO.	PART DESCRIPTION	LENGTH	UNIT WT.
1	2	SCX4	CROSSOVER PLATE	8 1/2 in	6.02
2	16	G12FW	1/2" HDG USS FLATWASHER		0.03
3	16	G12LW	1/2" HDG LOCKWASHER		0.01
4	16	G12NUT	1/2" HDG HEAVY 2H HEX NUT		0.07
5	4	G12R-8	1/2" x 8" THREADED ROD (HDG.)		0.35
6	4	X-UB1212	1/2" X 2-1/2" X 4-1/2" X 2" U-BOLT (HDG.)		0.63
TOTAL WT. #					17.87

TOLERANCE NOTES			DESCRIPTION		PART NO.	
TOLERANCES ON DIMENSIONS, UNLESS OTHERWISE NOTED ARE: SAWED, SHEARED AND GAS CUT EDGES (± 0.030") DRILLED AND GAS CUT HOLES (± 0.030") - NO CONING OF HOLES LASER CUT EDGES AND HOLES (± 0.010") - NO CONING OF HOLES BENDS ARE ± 1/2 DEGREE ALL OTHER MACHINING (± 0.030") ALL OTHER ASSEMBLY (± 0.080")			BACK TO BACK PIPE MOUNT		BBPM-K1	
DRAWING NOTES: THE DATA AND TECHNIQUES CONTAINED IN THIS DRAWING ARE PROPRIETARY INFORMATION OF VALMONT INDUSTRIES AND CONSIDERED A TRADE SECRET. ANY USE OR DISCLOSURE WITHOUT THE CONSENT OF VALMONT INDUSTRIES IS STRICTLY PROHIBITED.			CPD NO.	DRAWN BY	ENG. APPROVAL	DWG. NO.
			81	CEK	1/17/2013	1/18/2013
			CLASS	SUB	DRAWING USAGE	CHECKED BY
			81	03	CUSTOMER	BMC
			DATE		1 OF 1	

2 PROPOSED CROSSOVER PLATE DETAIL
SCALE: N.T.S.

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SUPPLEMENTAL

SHEET NUMBER:
R-609

REVISION:
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