

HERLONG RD BRECKE KIDGE RD **LOCATION MAP** 

FROM JACKSONVILLE INTERNATIONAL AIRPORT: HEAD NORTHWEST ON YANKEE CLIPPER OR. CONTINUE ONTO DIXIE CLIPPER DR. TURN RIGHT ONTO PECAN PARK RD. USE THE RIGHT 2 LANES TO TURN RIGHT ONTO DIVAL RD. USE THE RIGHT LANE TO MERGE ONTO 1-295 S VIA THE RAMP TO 1-10. MERGE ONTO 1-295 S. TAKE EXIT 21B TO MERGE ONTO 1-10 W TOWARD LAKE CITY, TAKE EXIT 324 TOWARD US-90 W. KEEP LEFT AT THE FORK, FOLLOW SIGNS FOR OLUSTEE/LAKE CITY. TURN LEFT ONTO US-90 W. TURN LEFT ONTO FL-10A W/SE BAYA DR. TURN LEFT AFTER MCDONALD'S (ON THE RIGHT). SLIGHT RIGHT ONTO FL-47 S. TURN RIGHT ONTO SW ELIM CHURCH RD. TURN RIGHT ONTO SW BRECKENRIDGE LN, 0.1 MI. DESTINATION WILL BE ON THE RIGHT.

**DRIVING DIRECTIONS** 

# PROPOSED COLLOCATION ONTO **EXISTING TELECOMMUNICATIONS FACILITY**

SITE NAME:

## **FORT WHITE**

SITE ADDRESS:

# SW ELIM CHURCH RD FORT WHITE, FL 32038 (COLUMBIA COUNTY)

N 29° 58' 42.60" (NAD '83)\* W 82° 45' 00.54" (NAD '83)\* GROUND ELEVATION = 56' (AMSL)\* 2020 FLORIDA BUILDING CODE COORDINATES AND GROUND ELEVATIONS TAKEN FROM GOOGLE EARTH (7TH EDITION)
FLORIDA CODE COUNCIL

## **TOWER COORDINATES**

L3 HARRIS TECHNOLOGIES, INC. 7022 TPC DRIVE SUITE 500 ORLANDO, FL 32822 UNKNOWN UNKNOWN

#### PROPERTY OWNER:

## SITE APPLICANT:

NAME ADDRESS CITY, STATE, ZIP CONTACT PHONE

AREA OF CONSTRUCTION: PRESENT OCCUPANCY TYPE: PROPOSED OCCUPANCY TYPE: CURRENT ZONING: PARCEL ID:

100± S.F.
TELECOMMUNICATIONS FACILITY TELECOMMUNICATIONS FACILITY 07-6S-16-03789-006 COLUMBIA COUNTY

#### UTILITIES:

POWER COMPANY: CONTACT: PHONE: CLAY ELECTRIC COOPERATIVE, INC. CUSTOMER SERVICE (800) 224-4917 154 740 956 METER # NEAR SITE: UNKNOWN

TELEPHONE COMPANY: CONTACT: PHONE: PEDESTAL # NEAR SITE:

## **PROJECT SUMMARY**

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

# 6. LOCAL BUILDING CODE

## CODE COMPLIANCE

### SURVEYOR:

NAME ADDRESS CITY, STATE, ZIP CONTACT PHONE

## **CIVIL ENGINEER:**

TOWER ENGINEERING PROFESSIONALS 326 TRYON ROAD RALEIGH, NC 27603 JOSHUA H. CARDEN, P.E. (919) 661–6351

#### STRUCTURAL ENGINEER:

## **ELECTRICAL ENGINEER:**

TOWER ENGINEERING PROFESSIONALS 326 TRYON ROAD RALEIGH, NC 27603 JOSHUA H. CARDEN, P.E. (919) 661–6351

### **GEOTECHNICAL ENGINEER:**

#### **TOWER MANUFACTURER:**

NAME ADDRESS CITY, STATE, ZIP CONTACT PHONE

## **PROJECT TEAM**



5046 TENNESSEE CAPITAL BLVD TALLAHASSEE, FLORIDA 32303 (800) 649-5783



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FLORIDA ONE-CALL IT'S THE LAW

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.

## **UTILITY STATEMENT**

SHEET	DESCRIPTION	REV
T1	TITLE SHEET	1
N1	PROJECT NOTES	1
C1	SITE PLAN	1
C2	TOWER ELEVATION	1
С3	ANTENNA & COAX MOUNTING DETAILS	1
C4	ANTENNA PLANS	1
E1	ELECTRICAL NOTES	1
E2	GROUNDING DETAILS	1
	Plans Reviewed for Code Compliance	
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	an Buildi	
	County Building	
	Plane 10	
	Plans 8	
	Reviewed 2	
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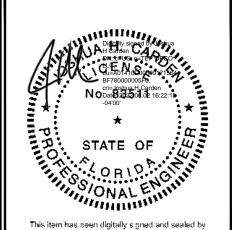
**INDEX OF SHEETS** 



FL COA# 31011

1	06-02-22	CONSTRUCTION
0	05-31-22	PRELIMINARY CONSTRUCTION
REV	DATE	ISSUED FOR:

DRAWN BY: GSB CHECKED BY:



JOSHUA H. CARDEN using a Digital Signature and date. Printed copies of this document are not considered signed and scaled and the signature must be verified on any electronic copies.

June 2, 2022

SHEET NUMBER:

Τ-1

**REVISION** 

## **GENERAL NOTES:**

- ALL REFERENCES TO OWNER IN THESE DOCUMENTS SHALL BE CONSIDERED WILLIAMS COMMUNICATIONS, INC. 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 FLORIDA.
- 3. WORK SHALL BE COMPLETED IN ACCORDANCE WITH THE FLORIDA STATE BUILDING CODE, 2020 EDITION.
- 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 SUPERCEDE 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 VERIFICATIONS. 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 SUPERVISES 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, STATE, AND FEDERAL SAFETY CODES AND REGULATIONS GOVERNING
- 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 RESIDENT LEASING AGENT FOR APPROVAL.
- 11. BILL OF MATERIALS AND PART NUMBERS LISTED ON CONSTRUCTION DRAWINGS ARE INTENDED TO AID CONTRACTOR. CONTRACTOR SHALL VERIFY PARTS AND QUANTITIES WITH MANUFACTURER PRIOR TO BIDDING AND/OR ORDERING MATERIALS.
- 12. ALL PERMITS THAT MUST BE OBTAINED ARE THE RESPONSIBILITY OF THE CONTRACTOR. THE CONTRACTOR WILL BE RESPONSIBLE FOR ABIDING BY ALL CONDITIONS AND REQUIREMENTS OF THE PERMITS.
- 13. THE CONTRACTOR SHALL REWORK (DRY, SCARIFY, ETC.) ALL MATERIAL NOT SUITABLE FOR SUBGRADE IN IT PRESENT STATE. AFTER REWORKING, IF THE MATERIAL REMAINS UNSUITABLE, THE CONTRACTOR SHALL UNDERCUT THIS MATERIAL AND REPLACE WITH APPROVED MATERIAL. ALL SUBGRADES SHALL BE PROOFROLLED WITH A FULLY LOADED TANDEM AXLE DUMP TRUCK PRIOR TO PAVING. ANY SOFTER MATERIAL SHALL BE REWORKED OR REPLACED.
- 14. 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.
- 15. ALL MATERIALS AND WORKMANSHIP SHALL BE WARRANTED FOR ONE YEAR FROM ACCEPTANCE DATE.
- 16. ALL BUILDING 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.

PLANS PREPARED FOR:



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PROJECT INFORMATION:

## **FORT WHITE**

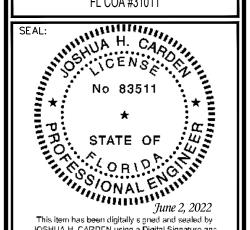
SW ELIM CHURCH RD FORT WHITE, FL 32038 (COLUMBIA COUNTY)

PLANS PREPARED BY:



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

FL COA #31011



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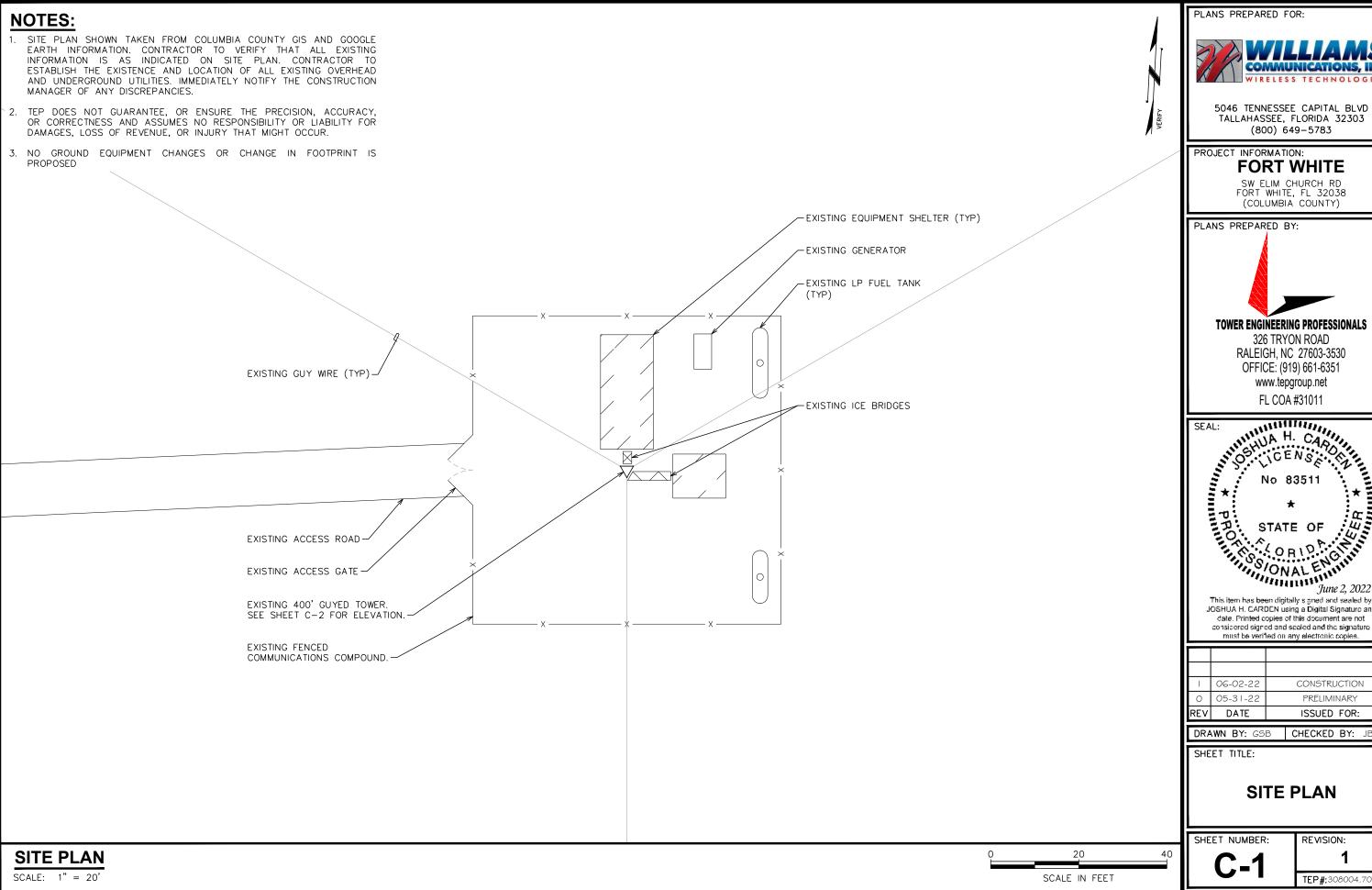
SHEET TITLE:

**PROJECT NOTES** 

SHEET NUMBER:

N-1

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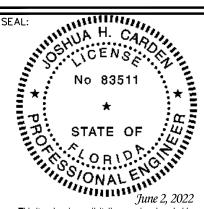
## **FORT WHITE**

SW ELIM CHURCH RD FORT WHITE, FL 32038 (COLUMBIA COUNTY)



### TOWER ENGINEERING PROFESSIONALS

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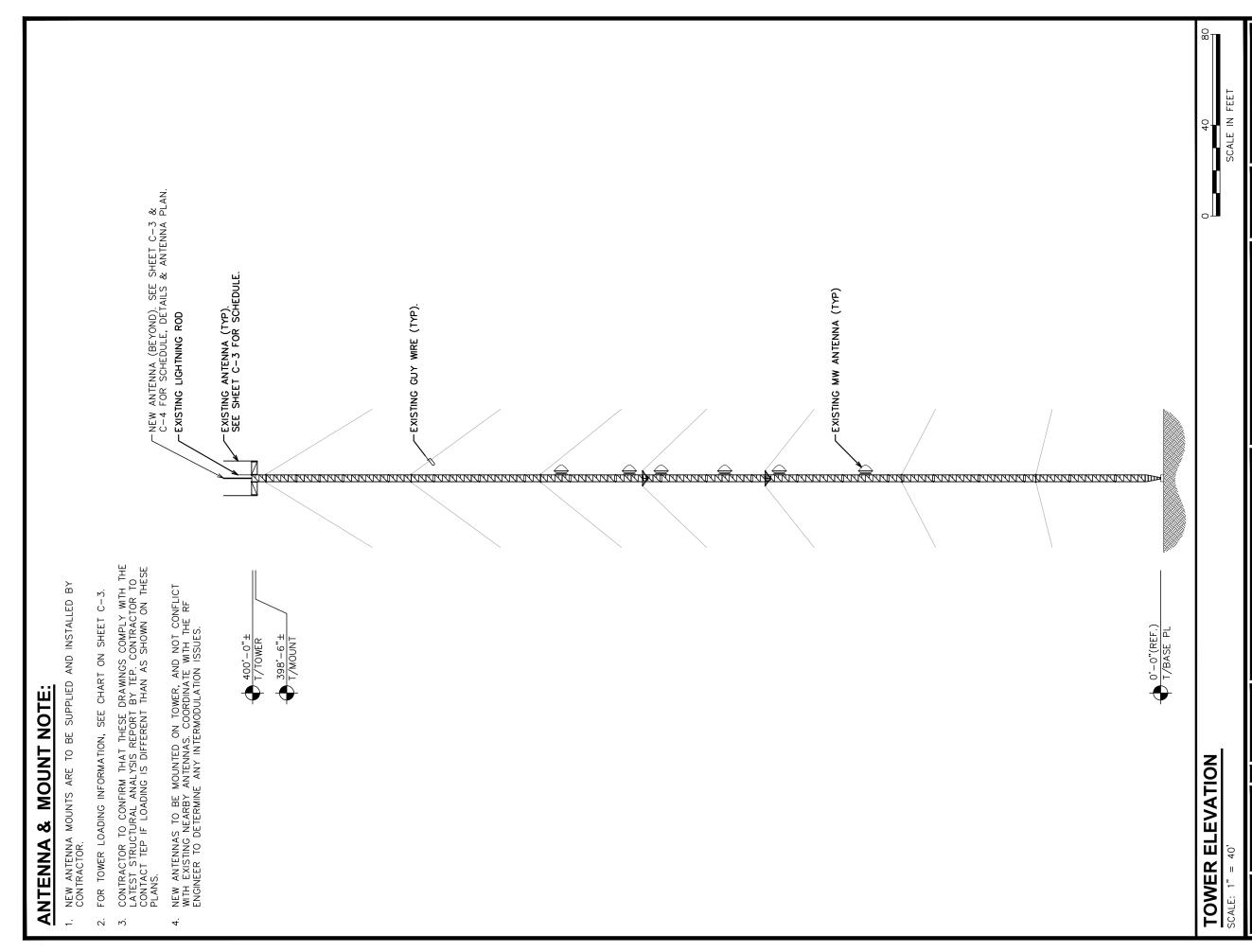


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SHEET TITLE:

**TOWER ELEVATION** 

SHEET NUMBER:

REVISION:

## **NOTES:**

- 1. MOUNTS SUPPLIED AND INSTALLED BY CONTRACTOR.
- 2. VERIFY LEG SIZE WITH TOWER MANUFACTURER.
- 3. SIDE STABILIZER REQUIRED.



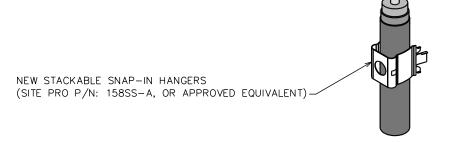
## **TYPICAL ANTENNA MOUNT DETAIL**

SCALE: N.T.S.

## **NOTES:**

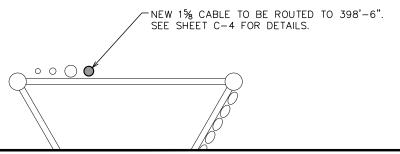
SNAP-IN HANGERS AND CUSHIONS TO BE SUPPLIED AND INSTALLED BY CONTRACTOR. HANGERS TO BE ATTACHED TO TOWER AND MOUNT STEEL WITH CABLE STANDOFF BRACKETS.

## COAX



## **SNAP-IN HANGER DETAILS**

SCALE: N.T.S.



# ANTENNA AND COAX SCHEDULE

## NOTE:

CONTRACTOR TO VERIFY THAT ALL LOADING SHOWN ON THESE DRAWINGS COMPLIES WITH THE LATEST STRUCTURAL ANALYSIS REPORT BY TOWER ENGINEERING PROFESSIONALS.

#### **NEW EQUIPMENT IN BOLD**

	ANTENNA & CABLE SCHEDULE							
ITEM	MANUFACTURER (MODEL #) <sup>+</sup>	ITEM DESCRIPTION	AZIMUTH	LEG	ELEVATION*	CABLE MAKE/MODEL	COAX SIZE**	COAX LENGTH
1	RFS PAD6-59	6'ø DISH	270°	AB FACE	130'-0"	EW52	EW52	140'-0"±
2	RFS PAD8-59	8'ø DISH	270°	AB FACE	168'-0"	EW52	EW52	178'-0"±
3	RFS PAD8-59	8'ø DISH	105°	AB FACE	192'-0"	EW52	EW52	202'-0"±
4	RFS PAD8-59	8'ø DISH	105°	AB FACE	220'-0"	EW52	EW52	230'-0"±
5	RFS PAD6-59	6'ø DISH	15°	AB FACE	234'-0"	EW63	EW63	244'-0"±
6	RFS PAD6-59	6'ø DISH	15°	AB FACE	264'-0"	EW63	EW63	274'-0"±
7	COMMANDER TECH. A08410M-24TO	ОМИІ	N/A	В	398'-6"	N/A	(1) 15/8" (1) 7/8"	408'-6"±
8	COMMANDER TECH. A08410M-24TO	ОМИІ	N/A	С	398'-6"	N/A	(1) %" (1) %"	408'-6"±
9	COMMANDER TECH. AO8410M-24TO	OMNI	N/A	Α	398'-6"	N/A	(1) 15% "	408'-6"±

- + TO BE INSTALLED PER MANUFACTURER RECOMMENDATIONS.
- \* ALL ANTENNA ELEVATIONS ARE CENTERLINE OF MOUNT.
- \*\* CABLES TO BE PLACED ON THE TOWER PER LATEST STRUCTURAL ANALYSIS REPORT BY TOWER ENGINEERING PROFESSIONALS

PLANS PREPARED FOR:



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## PROJECT INFORMATION:

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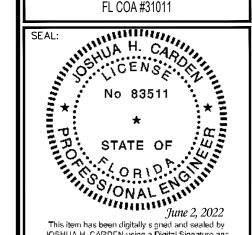
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SHEET TITLE:

**ANTENNA & COAX MOUNTING DETAILS** 

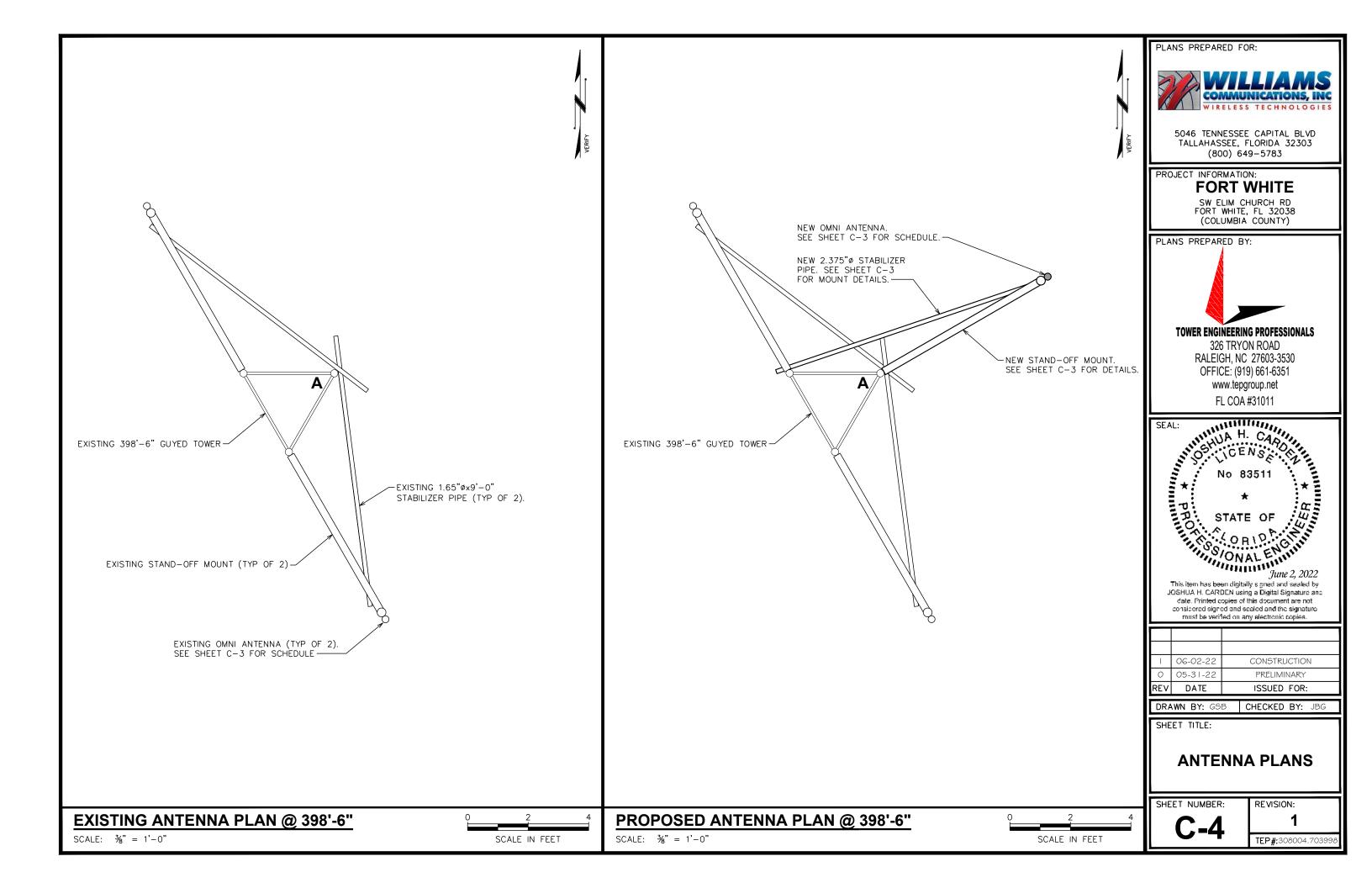
SHEET NUMBER:

REVISION:

TEP#:308004.70

## **COAX PLAN**

SCALE: N.T.S.



### SCOPE:

ALL ELECTRICAL WORK SHALL BE PERFORMED BY COMPANIES PROPERLY LICENSED BY THE AZ STATE ELECTRICAL BOARD OF EXAMINERS, SCOPE SHALL INCLUDE ALL LABOR, MATERIALS AND APPLIANCES REQUIRED FOR THE FURNISHING, INSTALLING AND TESTING, COMPLETE AND READY FOR OPERATION OF ALL WORK SHOWN ON THE DRAWING AS SPECIFIED HEREIN:

- 1. ELECTRIC SERVICE
- 3 CONDUCTORS

5. TELEPHONE CONDUITS

- 2. CONDUIT AND RACEWAY
- 4. MISCELLANEOUS MATERIALS
- 6. LIGHTNING ARRESTING SYSTEM

## CODES:

THE INSTALLATION SHALL COMPLY WITH ALL LAWS APPLYING TO ELECTRICAL INSTALLATION IN EFFECT WITH THE REGULATIONS OF THE LATEST EDITION OF THE NATIONAL ELECTRICAL SAFETY CODE AND THE NEC 2017, ADMINISTRATIVE RULES WITH THE NATIONAL ELECTRIC CODE, ALL LOCAL GOVERNING CODES AND ORDINANCES WITH THE REGULATION OF THE SERVING UTILITY COMPANY, AND FULLY COMPLIANT WITH THE STATE CONSTRUCTION OFFICE ELECTRICAL GUIDELINES. ALL PERMITS REQUIRED SHALL BE OBTAINED AND, AFTER COMPLETION OF WORK, THE OWNER SHALL BE FURNISHED A CERTIFICATE OF FINAL INSPECTION AND APPROVAL.

## **MATERIALS:**

MATERIALS TO BE NEW. USE OF USED OR SUB STANDARD MATERIAL IS NOT ACCEPTABLE. IN THE CASE OF EXISTING METERING EQUIPMENT OR PANELS, REQUIRED COMPONENTS SHALL BE NEW.

## TESTING:

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

#### **GUARANTEE:**

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 WITHOUT EXPENSE TO THE OWNER, ALL WARRANTEE CERTIFICATES AND GUARANTEES FURNISHED BY THE MANUFACTURERS SHALL BE TURNED OVER TO THE OWNER

#### COORDINATION:

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

#### **EXAMINATION OF SITE:**

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

### **CUTTING, PATCHING AND EXCAVATION:**

- COORDINATION OF ALL SLEEVES, CHASES, ETC., WILL BE REQUIRED PRIOR TO THE CONSTRUCTION OF ANY PORTION OF THE WORK. ALL CUTTING AND PATCHING OF WALLS, PARTITIONS, FLOORS, AND CHASES IN CONCRETE, WOOD, STEEL OR MASONRY SHALL BE DONE AS PROVIDED ON THE DRAWINGS.
- 2. ALL EXCAVATIONS AND BACKFILLING INCIDENTAL TO THE WORK UNLESS SPECIFICALLY NOTED OTHERWISE ON THE DRAWINGS SHALL BE PROVIDED BY THE CONTRACTOR.

#### **EXTERIOR CONDUIT:**

UNDERGROUND RACEWAYS SHALL COMPLY WITH STATE CONSTRUCTION ELECTRIAL GUIDELINES, SECTION 26 05 33. ALL EXPOSED CONDUIT SHALL BE NEATLY INSTALLED AND RUN PARALLEL OR PERPENDICULAR TO STRUCTURAL ELEMENTS. SUPPORTS AND MOUNTING HARDWARE SHALL BE HOT DIPPED GALVANIZED STEEL.

## RACEWAYS:

- ALL CONDUCTORS SHALL BE INSTALLED IN CONDUIT. CONDUIT SHALL BE RIGID STEEL, EMT, OR SCH40 PVC. AS INDICATED ON THE DRAWINGS. ALUMINUM CONDUIT SHALL NOT BE ALLOWED.
- 2. WHERE INSTALLED ON EXTERIORS AND EXPOSED TO DAMAGE, ALL CONDUIT SHALL BE RIGID STEEL.
- 3. CONCEALED CONDUIT IN WALLS OR INTERIOR SPACES ABOVE GRADE MAY BE EMT.
- 4. UNDERGROUND CONDUITS SHALL BE RIGID STEEL OR SCH40 PVC AS INDICATED ON THE DRAWINGS.
- 5. ALL CONDUIT RUNS SHALL USE APPROVED COUPLINGS AND CONNECTORS. PROVIDE INSULATED BUSHING FOR ALL CONDUIT TERMINATIONS. ALL CONDUIT RUNS IN A WET LOCATIONS SHALL HAVE WATERPROOF FITTINGS. ALL EMT TERMINATIONS AND COUPLINGS SHALL BE MADE UTILIZING HEXAGONAL COMPRESSION CONNECTORS. NO POT METAL, SETSCREW, OR INDENTED TYPE FITTINGS SHALL BE UTILIZED.
- 6. PROVIDE SUPPORTS FOR ALL CONDUITS IN ACCORDANCE WITH NEC REQUIREMENTS. ALL CONDUITS SHALL BE SIZED AS REQUIRED BY NEC
- 7. BURIAL DEPTH OF ALL CONDUITS SHALL BE AS REQUIRED BY CODE FOR EACH SPECIFIC CONDUIT TYPE AND APPLICATION.
- 8. CONDUIT ROUTES ARE SCHEMATIC. CONTRACTOR SHALL FIELD VERIFY BEFORE BID. COORDINATE ROUTE WITH WIRFLESS CARRIER AND BUILDING OWNER
- 9. UNDERGROUND AND ABOVE GROUND RACEWAYS SHALL NOT BE RELIED ON FOR GROUNDING CONTINUITY.

## **EQUIPMENT:**

- 1. ALL DISCONNECT SWITCHES SHALL BE SERVICE ENTRANCE RATED, HEAVY DUTY TYPE.
- 2. NEW CIRCUIT BREAKERS SHALL BE RATED TO WITHSTAND THE MAXIMUM AVAILABLE FAULT CURRENT AS DETERMINED BY THE LOCAL UTILITY. CONTRACTOR SHALL VERIFY MAXIMUM AVAILABLE FAULT CURRENT, AND COORDINATE INSTALLATION WITH THE LOCAL UTILITY BEFORE STARTING WORK, CONTACT TEP IF FAULT CURRENT EXCEEDS BREAKER RATING.

## CONDUCTORS:

- 1. FURNISH AND INSTALL CONDUCTORS CALLED FOR IN THE DRAWINGS. ALL CONDUCTORS SHALL HAVE TYPE THWN OR THW (75 °C) INSULATION, RATED FOR 600 VOLTS.
- 2. ALL CONDUCTORS SHALL BE COPPER, THE USE OF ALUMINUM CONDUCTORS SHALL NOT BE ALLOWED. ALL CONDUCTORS SHALL BE UL LISTED AND SHALL BE PROVIDED AND INSTALLED AS FOLLOWS:
  - A. MINIMUM WIRE SIZE SHALL BE #12 AWG.
  - B. ALL CONDUCTORS SIZE #8 AND LARGER SHALL BE STRANDED. CONDUCTORS SIZED #10 AND SMALLER MAY BE SOLID OR STRANDED
  - C. CONNECTION FOR #10 AWG AND SMALLER SHALL BE BY TWISTING TIGHT AND INSTALLING INSULATED PRESSURE OR WIRE NUT CONNECTORS.
  - D. CONNECTION FOR #8 AWG AND LARGER SHALL BE BY USE OF STEEL CRIMP-ON SLEEVES WITH NYLON
- 3. ALL CONDUCTORS SHALL BE COLOR CODED IN ACCORDANCE WITH NEC STANDARDS.
- 4. THE RACEWAY SYSTEM SHALL BE COMPLETE BEFORE INSTALLING CONDUCTORS.
- 5. A FULL SIZE NEUTAL SHALL BE PROVIDED FOR EACH CIRCUIT. NO SHARING OF NEUTRAL BETWEEN CIRCUITS

## PENETRATIONS:

CONTRACTOR SHALL COMPLY WITH THE LATEST UL PENETRATION DETAILS FOR PENETRATIONS OF ALL RATED WALLS, ROOF, ETC. SEE SHELTER MANUFACTURER DRAWINGS FOR ANY AND ALL PENETRATION DETAILS.

### GROUNDING:

- ALL 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 BUSSES, ETC. THE NEUTRAL CONDUCTOR FOR EACH SYSTEM SHALL BE GROUNDED BY ONE POINT ONLY.
- 2. PROVIDE GROUND CONDUCTOR IN ALL RACEWAYS.

PHASE

- 3. PROVIDE BONDING AND GROUND TO MEET NFPA 780 LIGHTNING PROTECTION AS A MINIMUM AND MOTOROLA R56.
- 4. PROVIDE GROUNDING SYSTEM AS INDICATED ON THE DRAWINGS, AS REQUIRED BY THE NATIONAL ELECTRIC CODE AND EQUIPMENT MANUFACTURER'S GROUNDING SPECIFICATIONS.

## ABBREVIATIONS AND LEGEND

PANEL AMPERE ΔFG ABOVE FINISHED GRADE PNIBD - PANFIBOARD ΔTS - AUTOMATIC TRANSFER SWITCH PVC - SCH40 RIGID NON-METALLIC CONDUIT ΔWG RGS AMFRICAN WIRE GAUGE - RIGID GALVANIZED STEEL CONDUIT - UNDERWRITERS LABORATORIES BCW BARE COPPER WIRE UL BFG BELOW FINISHED GRADE V VOLTAGE BKR - BRFAKER W WATTS CKT CIRCUIT XFMR TRANSFORMER DISC XMTR - TRANSMITTER DISCONNECT EMT ELECTRIC METALLIC TUBING ---E--- UNDERGROUND ELECTRICAL CONDUIT FSC FLEXIBLE STEEL CONDUIT GEN GENERATOR ----T--- UNDERGROUND TELEPHONE CONDUIT GPS - GLOBAL POSITIONING SYSTEM KILOWATT-HOUR METER GRD GROUND UNDERGROUND BONDING AND IGB ISOLATED GROUND BAR GROUNDING CONDUCTOR. INTERIOR GROUND RING (HALO) **IGR** Ø GROUND ROD ΚW KILOWATTS CADWELD NEC NATIONAL ELECTRIC CODE

PLANS PREPARED FOR



5046 TENNESSEE CAPITAL BLVD TALLAHASSEE, FLORIDA 32303 (800) 649-5783

## PROJECT INFORMATION:

## **FORT WHITE**

SW ELIM CHURCH RD FORT WHITE, FL 32038 (COLUMBIA COUNTY)

PLANS PREPARED BY:



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

FL COA #31011



JOSHUA H. CARDEN using a Digital Signature and date. Printed copies of this document are not considered signed and scaled and the signature must be verified on any electronic copies.

- 1	06-02-22	CONSTRUCTION
0	05-31-22	PRELIMINARY
REV	DATE	ISSUED FOR:

DRAWN BY: GSB CHECKED BY: JBG

SHEET TITLE:

**ELECTRICAL** NOTES

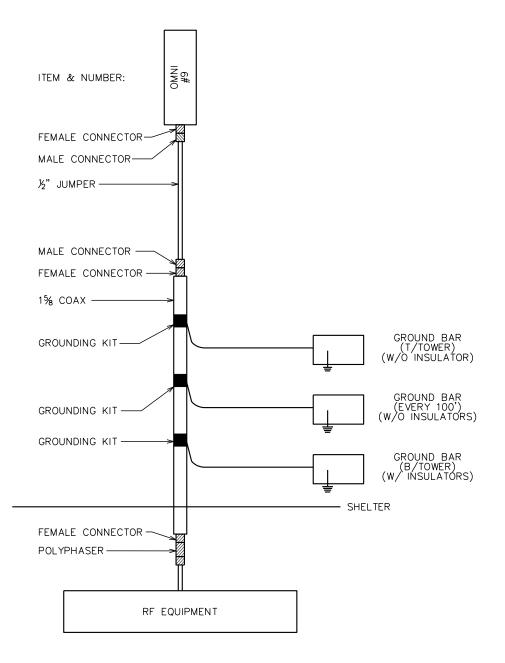
SHEET NUMBER:

GROUND ROD WITH INSPECTION WELL

REVISION:

## NOTE:

THIS SCHEMATIC IS FOR PROPOSED TOWER EQUIPMENT, NOT EXISTING OR RESERVED. REFERENCE SHEET C-2 FOR DETAILS.



PLANS PREPARED FOR:



5046 TENNESSEE CAPITAL BLVD TALLAHASSEE, FLORIDA 32303 (800) 649-5783

## PROJECT INFORMATION:

## **FORT WHITE**

SW ELIM CHURCH RD FORT WHITE, FL 32038 (COLUMBIA COUNTY)

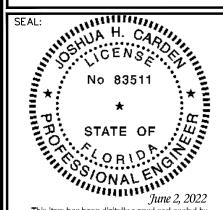
PLANS PREPARED BY:



#### **TOWER ENGINEERING PROFESSIONALS**

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

FL COA #31011



June 2, 2022
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ı	- 1	06-02-22	CONSTRUCTION
ı	0	05-31-22	PRELIMINARY
ı	REV	DATE	ISSUED FOR:

DRAWN BY: GSB | CHECKED BY: JBG

SHEET TITLE:

# GROUNDING DETAILS

SHEET NUMBER:

**E-2** 

REVISION:

TEP#:308004.703998

**ANTENNA CABLE & GROUNDING SCHEMATIC** 

SCALE: N.T.S.