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5/14/99

# UTILITY CONSTRUCTION

GENERAL UTILITY NOTES:

1. ALL UTILITY CONSTRUCTION, WORKMANSHIP, AND MATERIALS ARE TO BE IN ACCORDANCE WITH THE CITY OF GREENSBORO STANDARD SPECIFICATIONS FOR WATER AND SEWER UTILITY CONSTRUCTION UNLESS OTHERWISE SPECIFIED IN THE CONTRACT DOCUMENTS.

2. THE CONTRACTOR SHALL VERIFY IN THE FIELD THE ALIGNMENT AND ELEVATION OF ALL EXISTING WATER MAINS AT CONNECTION AND TAP LOCATIONS PRIOR TO CONSTRUCTION.

3. ALL CHANGES MADE DURING THE CONSTRUCTION PHASE SHALL BE APPROVED BY THE CITY OF GREENSBORO ENGINEERING DIVISION PRIOR TO CONSTRUCTION.

4. CONTRACTOR SHALL FIELD VERIFY POSSIBLE CONFLICTS WELL IN ADVANCE OF PIPE LAYING OPERATIONS AS TO ALLOW THE ADJUSTMENT OF LINE AND GRADE WELL BEFORE CONFLICT. FAILURE TO DO THIS ON THE PART OF THE CONTRACTOR, MAY RESULT IN ADDITIONAL COST IN MATERIALS AND WORK TO THE CONTRACTOR, NOT PAID BY THE CITY.

5. DISTANCES AND/OR STATION REFERENCES SHOWN FOR WATER PIPE, VALVES, FITTINGS, REDUCERS OR HYDRANTS IN RELATION TO FIXED OBJECTS ARE APPROXIMATE.

6. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING RESTRAINED JOINT PIPE (IF INDICATED ON THE PLANS) OR THRUST BLOCKS AT ALL PROPOSED TEES, BENDS, TAPPING SLEEVES, REDUCERS, PLUGS, ETC., AS REQUIRED TO RESTRAIN THE PIPE WITH THE MINIMUM ALLOWABLE RESTRAINT BEING AS SPECIFIED IN THE CITY OF GREENSBORO STANDARD SPECIFICATIONS FOR WATER AND SEWER UTILITY CONSTRUCTION. ALL THRUST BLOCKING SHALL CONFORM TO THE THRUST BLOCK DETAILS AS PER CITY OF GREENSBORO STD. NO. 106.

7. THE CONTRACTOR SHALL RESTORE TO THEIR ORIGINAL STATE ALL CULVERTS, WALLS, GATES, FENCES, HEDGES, SHRUBS, MAIL BOXES, DRIVEWAYS, LIGHT POLES, POWER POLES, SIGNS, WATER LINES, GAS LINES, GAS VALVES, TELEPHONE PEDESTALS, WATER METERS, WATER VALVES, SANITARY SEWERS, SANITARY SERVICE LATERALS, LAWNS, GARDENS, AND ANY OTHER EXISTING ITEM DISTURBED OR MOVED DUE TO CONSTRUCTION. FINISHED AREAS CONTIGUOUS TO RESIDENTIAL LAWNS SHALL BE LANDSCAPED IN A MANNER SUCH THAT SOIL PARTICLES SHALL NOT EXCEED 1½INCHES IN DIAMETER (SEE "SEEDBED PREPARATION FOR LAWN AREAS" IN CONTRACT SPECIAL PROVISIONS). THE COST OF THE WORK WILL BE INCLUDED IN THE UNIT BID AND CONSTRUCTION PRICES FOR OTHER BID ITEMS IN THE CONTRACT.

8. ALL WORK MUST BE PERFORMED WITHOUT DISRUPTING THE OPERATION OF ANY EXISTING SANITARY SEWER OR WATER SERVICE UNLESS APPROVED OTHERWISE IN ADVANCE BY THE CITY OF GREENSBORO.

9. THE CONTRACTOR SHALL USE CAUTION WHEN WORKING AROUND EXISTING GAS, SEWER, WATER, ELECTRIC, TELEPHONE, FIBER OPTIC, OR CATV SERVICE LINES AND LATERALS, AND OTHER UTILITIES. ANY EXISTING UTILITY DAMAGED DURING CONSTRUCTION MUST BE REPLACED OR REPAIRED IMMEDIATELY. THE CONTRACTOR SHALL COORDINATE ANY NECESSARY UTILITY REPLACEMENT OR REPAIR OF THE UTILITY ONLY AFTER RECEIVING APPROVAL TO DO THE WORK FROM THE UTILITY OWNER. ANY AUTHORIZED REPAIRS ARE TO BE PER THE UTILITY OWNER'S APPROVED SPECIFICATIONS AND MATERIALS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL ASSOCIATED REPAIR COSTS.

10. THE CONTRACTOR SHALL COMPLY WITH ALL APPLICABLE OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION REGULATIONS.

11. NO SUBSURFACE PLANS FOR THE ROADWAY ARE AVAILABLE ON THIS PROJECT. THE CONTRACTOR SHALL MAKE HIS/HER OWN INVESTIGATION AS TO THE SUBSURFACE CONDITION.

12. THE CONTRACTOR SHALL COORDINATE ALL CONNECTION AND TESTING ACTIVITIES WITH THE CITY OF GREENSBORO ENGINEERING DIVISION.

13. EXISTING UTILITY LOCATIONS SHOWN ON THE CONSTRUCTION PLANS WERE COMPILED BASED ON INFORMATION AVAILABLE TO THE ENGINEER. THESE LOCATIONS ARE NOT INTENDED TO BE EXACT OR COMPLETE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING ALL EXISTING UTILITY LOCATIONS AND ELEVATIONS WITH THE APPROPRIATE UTILITY COMPANIES. THE CONTRACTOR AGREES TO TAKE FULL RESPONSIBILITY FOR ANY AND ALL DAMAGES TO UTILITIES THAT MAY OCCUR DUE TO FAILURE TO EXACTLY LOCATE AND PROTECT ALL EXISTING UTILITIES. THE CONTRACTOR SHALL VERIFY LOCATIONS AND ELEVATIONS OF ALL EXISTING UTILITIES PRIOR TO CONSTRUCTION BY CONTACTING NORTH CAROLINA 811 (1-800-632-4949) OR THE APPROPRIATE UTILITY AUTHORITY AT LEAST FORTY-EIGHT (48) HOURS PRIOR TO PERFORMING ANY EXCAVATION.

GENERAL UTILITY NOTES CONTINUED:

14. ABANDONMENT:
THE FOLLOWING REQUIREMENTS SHALL APPLY FOR THE PROPOSED ABANDONMENT OF EXISTING FACILITIES UNLESS OTHERWISE SHOWN ON THE PLANS OR APPROVED BY THE ENGINEER. ALL AREAS DISTURBED BY ABANDONMENT WILL BE RESTORED. ABANDONMENT SHALL BE ACCOMPLISHED AFTER TIE IN OF ALL EXISTING SERVICES TO THE NEW WATER MAIN.

15. TRAFFIC CONTROL IS REQUIRED FOR ALL CONSTRUCTION ACTIVITIES WITHIN 15' OF THE EDGE OF ANY ROADWAY. TRAFFIC CONTROL DEVICES, PRACTICES, AND PROCEDURES SHALL BE IN ACCORDANCE WITH THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD) LATEST EDITION BY THE FEDERAL HIGHWAY ADMINISTRATION.

16. CONTRACTOR SHALL KEEP AND MAINTAIN A SET OF PLANS WITH ACCURATE LOCATIONS, MEASUREMENTS AND OTHER DATA NOT READILY AVAILABLE FROM ABOVE GROUND "AS-BUILT" EFFORTS. A COPY OF THESE PLANS SHALL BE SUBMITTED TO THE OWNER AT THE COMPLETION OF THE PROJECT.

17. SERVICE CLEANOUTS AND METER BOXES SHALL NOT BE LOCATED IN DRIVEWAYS, SIDEWALKS, OR STREETS. SEE CITY OF GREENSBORO DETAIL #101 FOR TYPICAL INSTALLATION LOCATION.

18. THE MAXIMUM OPEN JOINT DEFLECTION FOR ALIGNMENT AND GRADE FOR 12-INCH WATER MAIN SHALL BE (5) DEGREES.

19. FOR REFERENCE TO CITY OF GREENSBORO STANDARD DETAILS, SEE BELOW:

PROJECT SPECIFIC NOTES:

1. PROPOSED WATER LINES SHALL BE DUCTILE IRON RESTRAINED JOINT PC350 PIPE UNLESS INDICATED OTHERWISE.

2. CONTRACTOR'S ATTENTION IS DIRECTED TO SECTIONS 102, 107, AND 1550 OF THE STANDARD SPECIFICATIONS CONCERNING TRENCHLESS INSTALLATION. IT IS CONTRACTOR'S RESPONSIBILITY TO HAVE BORE DESIGNED AND SEALED BY A LICENSED NORTH CAROLINA PROFESSIONAL ENGINEER. NO DAMAGE IS ALLOWED TO RIVER, WETLANDS, OR BUFFER ZONES.

3. ENDS OF CASING PIPE SHALL BE SEALED IN A MANOR TO ALLOW LEAKAGE TO PASS BUT PREVENT FOREIGN MATERIAL ENTRY, IN CONFORMANCE WITH NCR 102 SECTION 4.5B.

4. CONSTRUCTION INSPECTION REQUIRED FOR W/L INSTALLATION. CALL (336) 373-2377 TO SCHEDULE AN INSPECTOR.

5. OPEN CUT AND REPAIR PAVEMENT PER COG STD. #107. CONTACT UTILITY COORDINATION AT (336) 373-2424 FOR PERMIT.

| PROJECT REFERENCE NO. | SHEET NO. |
|---|---|
| Y-4807B | UC-3 |
| DESIGNED BY: ABN | |
| DRAWN BY: ABN | |
| CHECKED BY: ASV | |
| APPROVED BY: | |
| REVISED: | |
| NORTH CAROLINA DEPARTMENT OF TRANSPORTATION | |
| UTILITIES ENGINEERING SEC. PHONE:(919)707-6690 FAX:(919)250-4151 | UTILITY CONSTRUCTION PLANS ONLY |

NORTH CAROLINA PROFESSIONAL SEAL 025221 ENGINEER ANDREW S. VANE
1/18/2024

UTILITY CONSTRUCTION

**DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED**

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