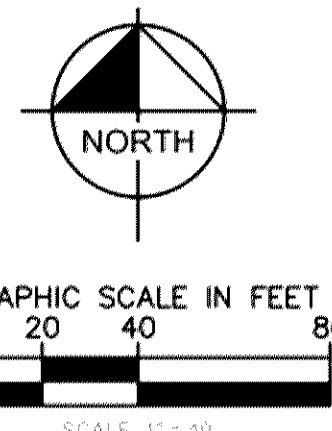


[illegible]

1. ALL FILL MATERIAL IS TO BE IN PLACE, AND COMPACTED BEFORE INSTALLATION OF PROPOSED UTILITIES.
2. SANITARY SEWER PIPE SHALL BE AS FOLLOWS:
10" PVC SCH 40 SCHEDULE 40S OR EQUIVALENT PER ASTM D 3034
6" PVC SCH 40S, SCHEDULE 40, OR EQUIVALENT PER ASTM D 3034
8" PVC SCHEDULE 40
DUCTILE IRON PIPE PER AWWA C150
3. WATER LINES SHALL BE AS FOLLOWS:
6" AND LARGER DUCTILE IRON PIPE PER AWWA C150
12" AND SMALLER USE CLASS 150
4. A MINIMUM OF 1 M. POLYVPWR IS REQUIRED ON ALL DIP
5. MINIMUM TRENCH WIDTH SHALL BE 2 FEET.
6. ALL WATER JOINTS ARE TO BE MECHANICAL JOINTS WITH THRUST BLOCKING AS CALLED OUT IN SPECIFICATIONS.
7. ALL UTILITIES SHOULD BE KEPT TEN (10) APART (PARALLEL) OR WHEN CROSSING: 18" VERTICAL CLEARANCE (OUTSIDE EDGE OF PIPE TO OUTSIDE EDGE OF PIPE).
8. CONTRACTOR SHALL MAINTAIN A MINIMUM OF 8" COVER ON ALL WATER LINES.
9. IN THE EVENT OF A VERTICAL CONTACT BETWEEN WATER LINES, SANITARY LINES, OR OTHER UTILITIES AS SPECIFIED HEREIN AND PROPOSED, THE SANITARY LINE SHALL BE SCH. 40 OR 50 AND WITH MECHANICAL JOINTS AT LEAST 10 FEET ON BOTH SIDES OF PROPOSED WATER LINE. WATER LINES SHALL BE MECHANICAL JOINTS WITH APPROPRIATE THRUST BLOCKING AS REQUIRED TO PROVIDE A MINIMUM OF 18" CLEARANCE. MEETING REQUIREMENTS OF AASHTO A21 AND 201 AND 211 (AWWA C151, CLASS 50)
10. LINES UNDERGROUND SHALL BE INSTALLED, INSPECTED AND APPROVE BEFORE BACKFILL.
11. TOPS OF EXISTING MANHOLES SHALL BE RAISED AS NECESSARY TO BE FLUSH WITH PROPOSED PAVEMENT ELEVATIONS, AND TO BE ONE FOOT ABOVE FINISHED GROUND ELEVATION BETWEEN AREAS, WITH WATER TIGHT LIDS.
12. ALL CONCRETE FOR ENCASEMENTS SHALL HAVE A MINIMUM 28 DAY COMPRESSION STRENGTH AT 3000 P.S.I.
13. EXISTING UTILITIES SHALL BE VERIFIED IN FIELD PRIOR TO INSTALLATION OF ANY NEW LINES.
14. REFER TO INTERIOR PLUMBING DRAWINGS FOR TIE-IN OF ALL UTILITIES.
15. THE CONTRACTOR IS SPECIFICALLY CAUTIONED THAT THE LOCATION AND/OR ELEVATION OF EXISTING UTILITIES AS SPECIFIED HEREIN ARE BASED ON RECORDS OF THE VARIOUS UTILITY COMPANIES, AND WHERE POSSIBLE, MEASUREMENTS TAKEN IN THE FIELD. INFORMATION FROM RECORDS OR FIELD MEASUREMENTS MAY BE IN ERROR. THE CONTRACTOR MUST CALL THE APPROPRIATE UTILITY COMPANIES AT LEAST 72 HOURS BEFORE ANY EXCAVATION TO REQUEST EXACT FIELD LOCATION OF UTILITIES IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO LOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.
15. CONTRACTOR IS RESPONSIBLE FOR ALL NECESSARY INSPECTIONS AND/OR CERTIFICATIONS REQUIRED BY THE CONTRACTOR TO SPECIFY ALL EXISTING UTILITIES.
16. CONTRACTOR SHALL COORDINATE WITH ALL UTILITY COMPANIES FOR INSTALLATION REQUIREMENTS AND SPECIFICATIONS.
17. REFER TO BUILDING PLANS FOR SITE LIGHTING ELECTRICAL PLAN.
18. BACKFLOW DEVICES (DVCY AND PRD ASSEMBLIES) AND METERS ARE LOCATED IN THE INTERIOR OF THE BUILDING (REF. ARCH. PLANS).
19. CONTRACTOR IS RESPONSIBLE FOR COMPLYING TO THE SPECIFICATIONS OF THE LOCAL UTILITIES BUREAU AND WITH REGARDERS TO MATERIALS AND INSTALLATION OF THE WATER AND SEWER LINES.
20. ALL ONSITE WATERMAINS AND SANITARY SEWERS SHALL BE PRIVATELY OWNED AND MAINTAINED.
21. ALL WATERMAIN SUBSTUOS SHALL BE MECHANICALLY RESTRAINED WITH REACTION BLOCKS TO PREVENT TENSILE FAILURE.
22. HOPE PIPE CONNECTIONS INTO ALL CONCRETE STRUCTURES MUST BE MADE WITH WATER TIGHT MATERIALS UTILIZING AN ALUM. OR WATERSTOP GASKET OR BOLT. CAST IN PLACE RUBBER STOP, OR APPROVED EQUIV.
23. TAPS OF LIVE WATER MAINS ARE DONE BY CITY FORCEWORKS AND PAID FOR AND COORDINATED WITH THE CONTRACTOR.
24. UTILITY AND MECHANICAL CONTRACTORS MUST COORDINATE THE INSTALLATION OF ALL WATER AND SEWER SERVICE PIPES INTO THE BUILDING TO ACCOMMODATE CITY INSPECTION TESTS.
25. ALL COMPONENTS OF THE WATER SYSTEM UP TO THE WATER METER OR FIRE SERVICE EQUIPMENT MUST UTILIZE PROTECTIVE INTERNAL COATINGS MEETING CURRENT AVAILABLE RECOMMENDATIONS FOR PROTECTIVE COATINGS OR SPECIAL COATINGS. THE USE OF UNLINED OR UNCOATED PIPE IS NOT ALLOWED.
26. ALL UNUSED WATER SERVICES MUST BE PROPERLY ABANDONED AT THE MAIN. ALL UNUSED SANITARY SERVICE SERVICES MUST PROPERLY ABANDONED AT THE PROPERTY LINE.
27. UTILITY PERMITS ARE REQUIRED FOR CONNECTIONS TO THE PUBLIC STORM, SANITARY, AND WATER SYSTEM. CONTACT CITY OF BLOOMINGTON UTILITIES DEPARTMENT (562-563-8777) FOR CURRENT INFORMATION.
28. RESTORE UTILITY TRENCHES PER STANDARDS LISTED IN ARTICLE 5, CH. 17 OF THE BLOOMINGTON CITY CODE (SEE UTILITY DETAILS).
29. INTERIOR CHIMNEY SEALS SHALL BE INSTALLED ON ALL SANITARY MANHOLES.

Revisions		
No.	Date	Description

Sheet Title
UTILITY PLAN

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