

WATER STERILIZATION SPECIFICATIONS

GENERAL

- All pipe shall be disinfected, tested and flushed in accordance with AWWA Standard C601 (latest revision). Water required for sterilization, testing and flushing shall be provided by the City of Roanoke.
- Contractor shall provide all materials, equipment, necessary taps and perform all work required for the sterilization, testing and flushing of the water main. All tests shall be performed only by the Office of City Engineer and the Water Department Laboratory.
- No tested section of water line shall be approved to deliver water service until a favorable laboratory report has been achieved. Any tested section of water line failing to meet the requirements specified shall be repaired by the Contractor and retested until the results are within the limits specified.
- The water main or valved off section that has been completed shall be filled, tested and flushed. Test locations shall be subject to the discretion of the Office of City Engineer and as valves and blow-offs permit.

STERILIZATION

- A chlorine-bearing compound (calcium hypochlorite) shall be used to disinfect all water mains. The compound shall be manufactured in accordance with AWWA Standard B300 (latest revision) and shall be "HTH" or an approved equal.
- After each length of pipe has been cleaned of debris and finally set and before installing the next length of pipe, place the chlorine-bearing compound 30 inches behind the bell and in a quantity as required to provide a minimum concentration of 100 parts per million of free chlorine when the pipe line is filled with water.
- The chlorine-bearing compound shall be placed within the pipe in dry powder form in the following quantities:

Size of Pipe	4"	6"	8"	12"	16"	20"
Container Caps	1/4	1/2	1	2	4	7

NOTES:

- All site plan construction shall be in strict conformance with VDOT Road and Bridge Standards and Specifications
- Pavement design shall be the same as shown on the Roadway Plan
- Erosion control devices shall comply with the Virginia Erosion Control Handbook
- Refer to the building plans for the actual location of utility lateral connections
- The City of Roanoke will provide all construction stake-out.

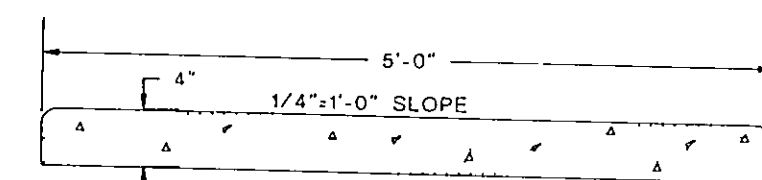
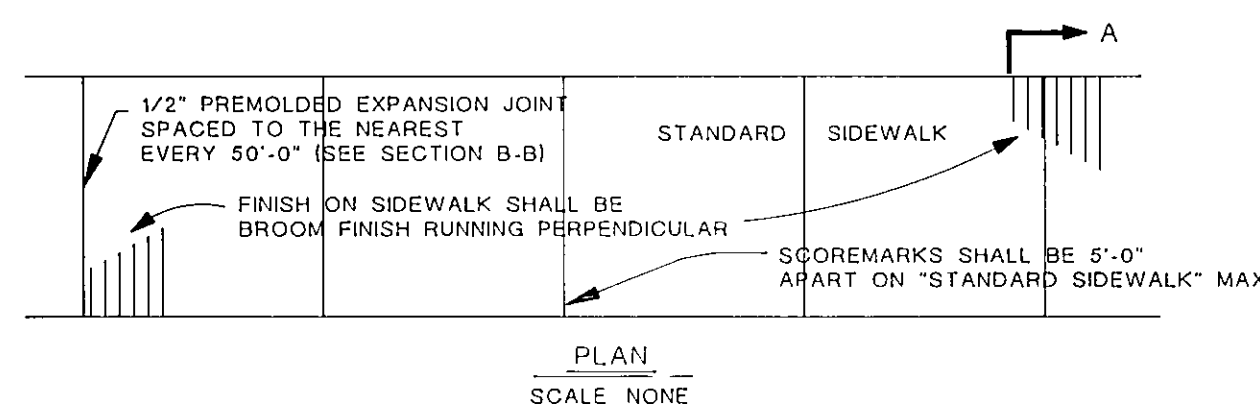
Item #2: SHEET SP-1: Add the following notes to sheet SP-1.

- Revise note 5 as follows, on sheet SP-1.
- The City of Roanoke will provide the survey work as follows:
 - It will stake the centerline of the road as well as the centerline of the water and sewer mains.
 - It will stake the corners of the building
 - It will establish the benchmark elevation at the building site.
 - It will establish the corners of the parking lot.

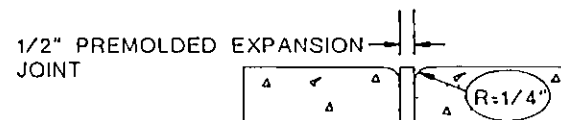
SEWER AND WATER CONNECTION FEES SHALL BE PAID FOR BY THE OWNER.

Item #2: SHEET SP-1: Add note 7 as follows:

- Additional grading beyond that shown on the drawings, to balance cut and fill, is permissible at no additional cost to the contract. On site subgrade material can be used as engineered fill under the direction of the Soils Engineer.



SECTION A-A
SCALE: NONE



SECTION B-B
SCALE: NONE

GENERAL NOTES:

- All concrete shall be Class A 4000 p.s.i.
- Sidewalk from parking lot to first entrance shall be on a 1 to 12 slope
- Sidewalk Finish: Sidewalk shall be smooth trowelled, then ending with a "Light Broom Finish" unless otherwise noted.
- When sidewalk abuts Curb or Building a 1/2" Premolded Expansion Joint is to be used.
- Curing shall be accomplished by the use of a liquid membrane seal containing White Pigment, applied at the rate of one (1) gallon per 150 square feet.
- Add two (2) inches to the concrete depth, 4 inches of aggregate base (21-A), and welded wire fabric (6"x6") for the concrete dumpster pad

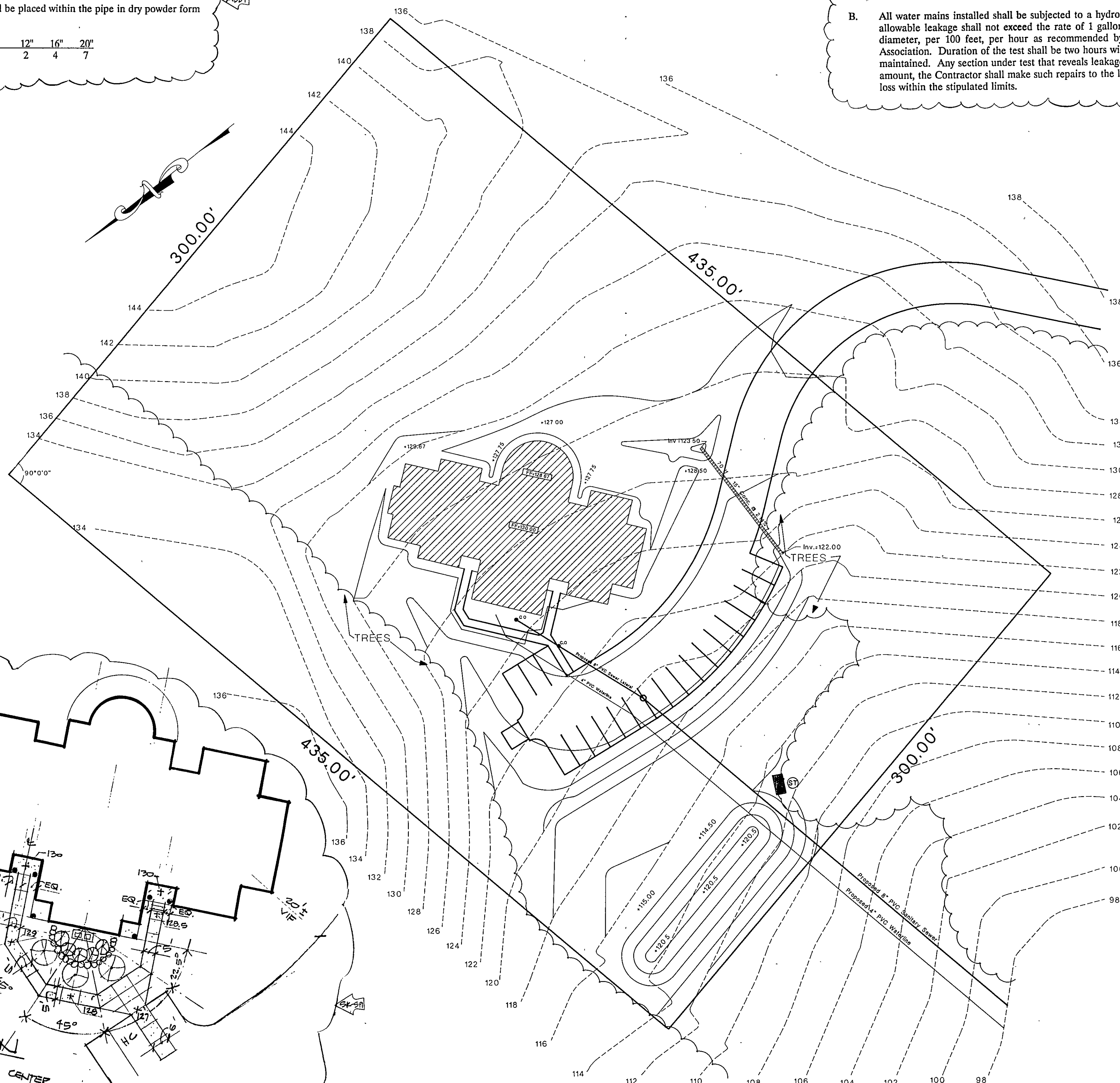
Sidewalk and Concrete Pad Details

WALK REVISION
11-20
CRISIS
7 MARCH 1992
NOTE: PLANTING TO N.I.C.

TESTING

- As soon as the main or valved off section has been laid and sufficiently backfilled for safety, water shall be turned on and the main allowed to fill slowly. Care shall be exercised not to flush the main at this time. Air only shall be allowed to escape.

The water shall be allowed to remain in the main for a minimum of 24 hours before flushing. Flush the main thoroughly to expel all of the chlorine. Flushed water shall drain within natural channels or dedicated easements to protect all property from damage. Laboratory samples shall be taken, in an approved method for testing, examined and a favorable report returned before any water may be delivered.
- All water mains installed shall be subjected to a hydrostatic test of 150 PSI. The allowable leakage shall not exceed the rate of 1 gallon per inch of nominal pipe diameter, per 100 feet, per hour as recommended by Cast-Iron Pipe Research Association. Duration of the test shall be two hours with the 150 PSI continuously maintained. Any section under test that reveals leakage in excess of the allowable amount, the Contractor shall make such repairs to the line as required to bring the loss within the stipulated limits.



RECORD DRAWING



City of Roanoke
Office of City Engineer
215 W. Church Avenue
Room 350
Roanoke, VA 24011
(703) 981-2731

Crisis Intervention Center
at Coyner Springs

Drawn By	DWD
Designed By	JAP III
Checked By	JAP III
Date	April 5, 1991
Scale	1"=30'
Plan Number	6171
Sheet	SP-1