

**TYPICAL HYDRANT LAYOUT**  
(VALVE IN BOULEVARD)

7/28/14



STANDARD DRAWING  
NO.  
**201D**

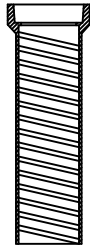


TYLER  
(OR APPROVED  
EQUAL)

NO. 6860

7.5' MINIMUM COVER REQUIRED OVER  
TOP OF 10" OR LARGER WATERMAIN.

8.0' MINIMUM COVER REQUIRED OVER  
TOP OF 6" TO 8" WATERMAIN.



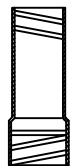
TOP  
TYLER  
(OR APPROVED  
EQUAL)

NO. 6860

26"

ADJUST TOP TO 1/2" BELOW  
GRADE. BOX TO BE SET TO  
PROVIDE 12" OF ADJUSTMENT

TYLER NO. 6860 OR APPROVED  
EQUIVALENT



EXTENSION  
TYLER  
(OR APPROVED  
EQUAL)

NO. 58  
NO. 59  
NO. 60

14"  
18"  
24"



BOTTOM  
TYLER  
(OR APPROVED  
EQUAL)

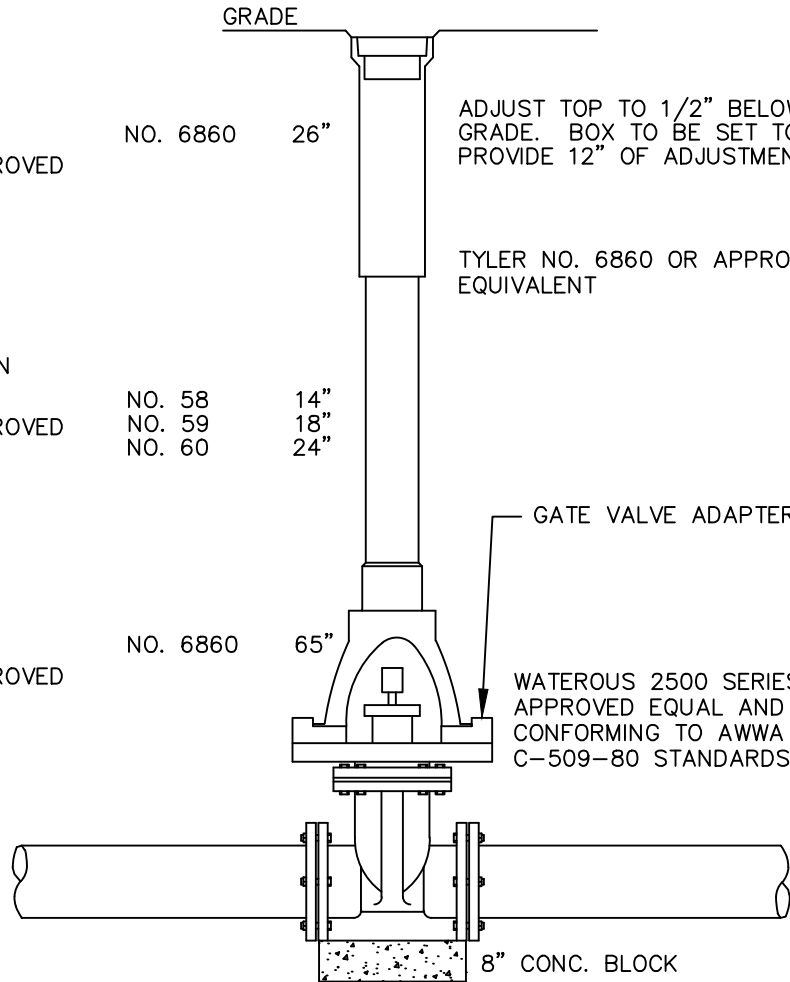
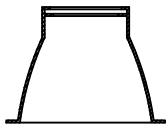
NO. 6860

65"

GATE VALVE ADAPTER

WATEROUS 2500 SERIES OR  
APPROVED EQUAL AND  
CONFORMING TO AWWA  
C-509-80 STANDARDS

BASE



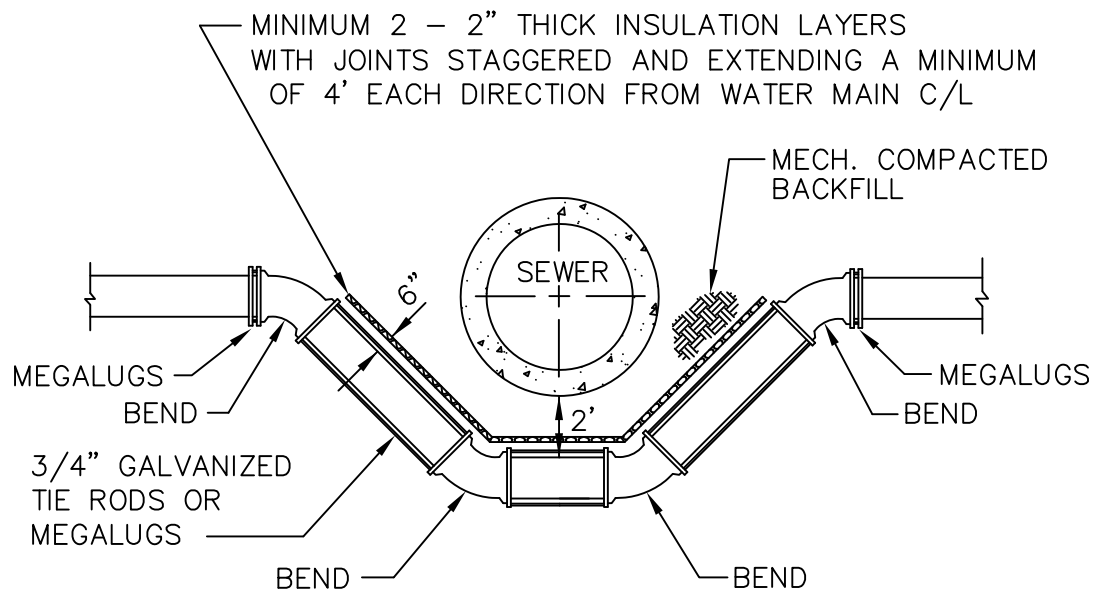
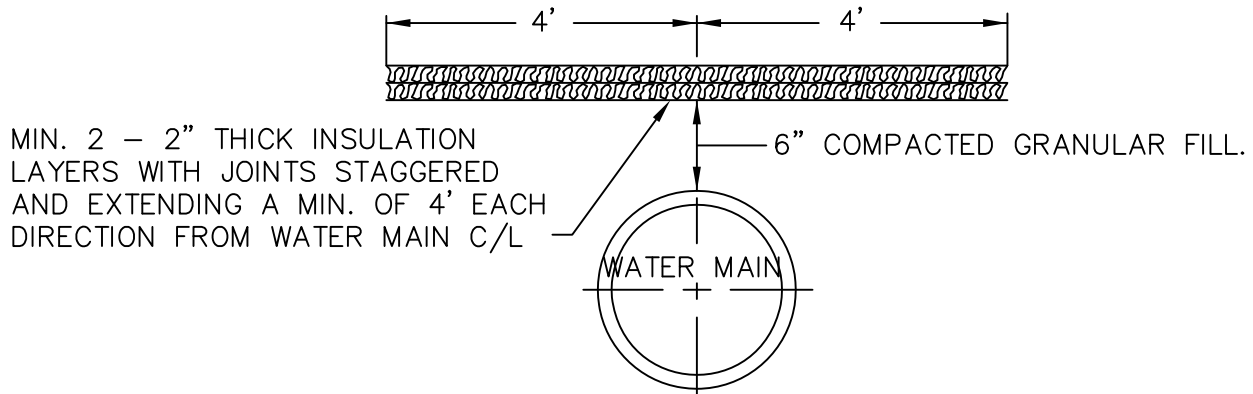
8" CONC. BLOCK

### GATE VALVE AND BOX

6/19/12



STANDARD DRAWING  
NO.  
**202A**



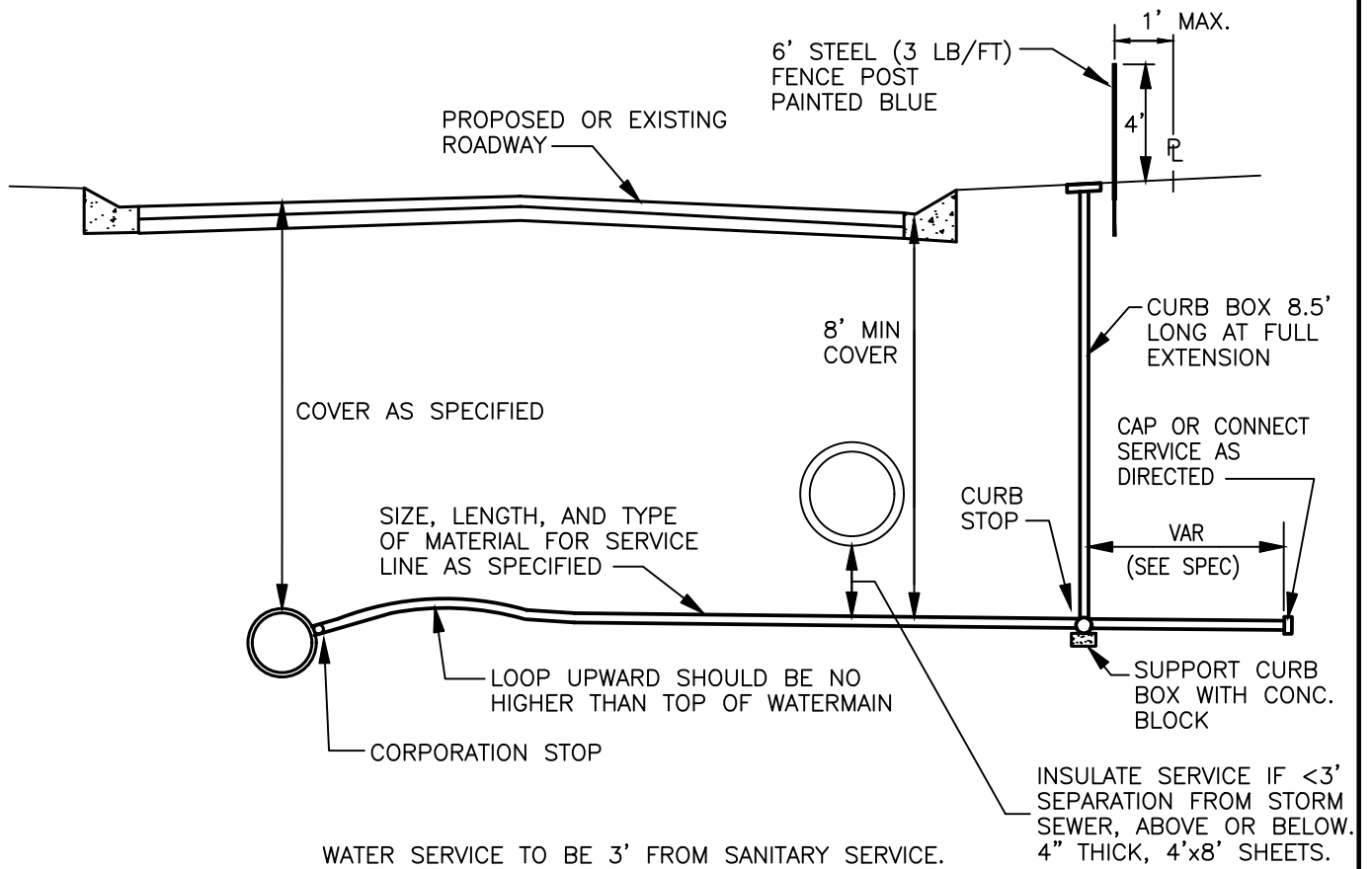
## WATER MAIN INSULATION

NOTE: INSULATE 4' WIDE ON CENTER FOR SERVICES

5/22/06



STANDARD DRAWING  
NO.  
**203A**

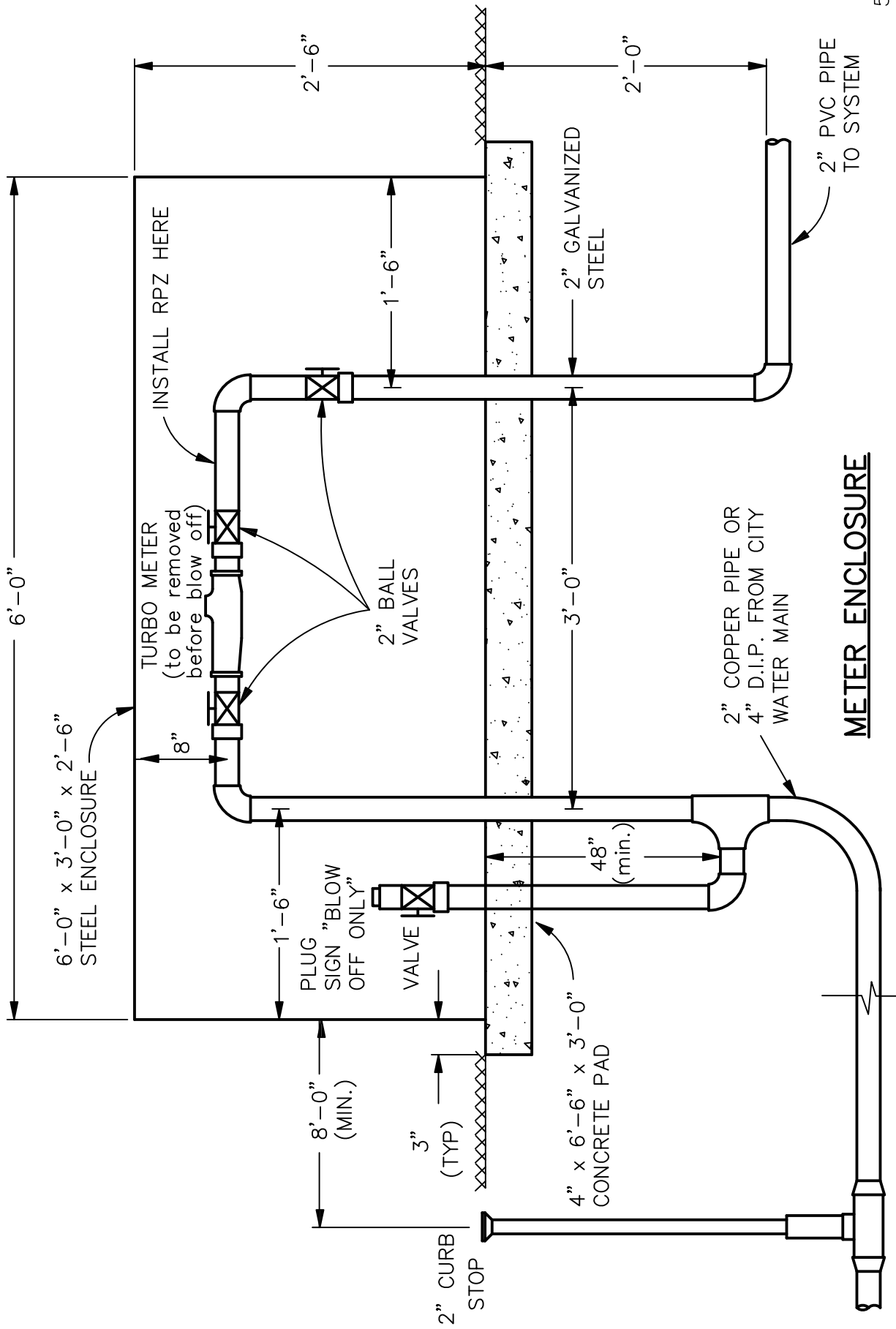


## WATER SERVICE DETAIL

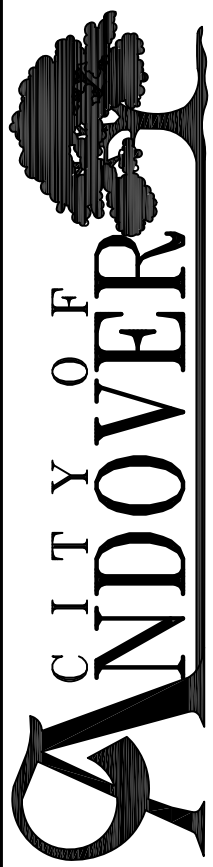
2/27/17



STANDARD DRAWING  
NO.  
**208B**



5/22/06



STANDARD DRAWING NO.

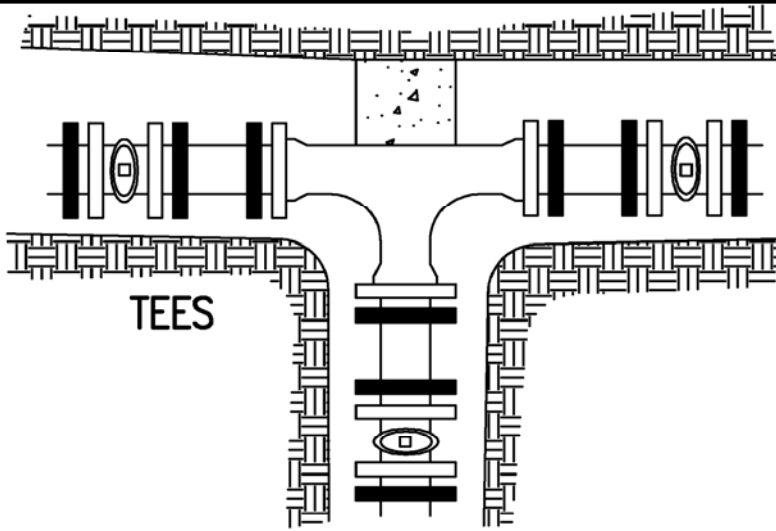
209



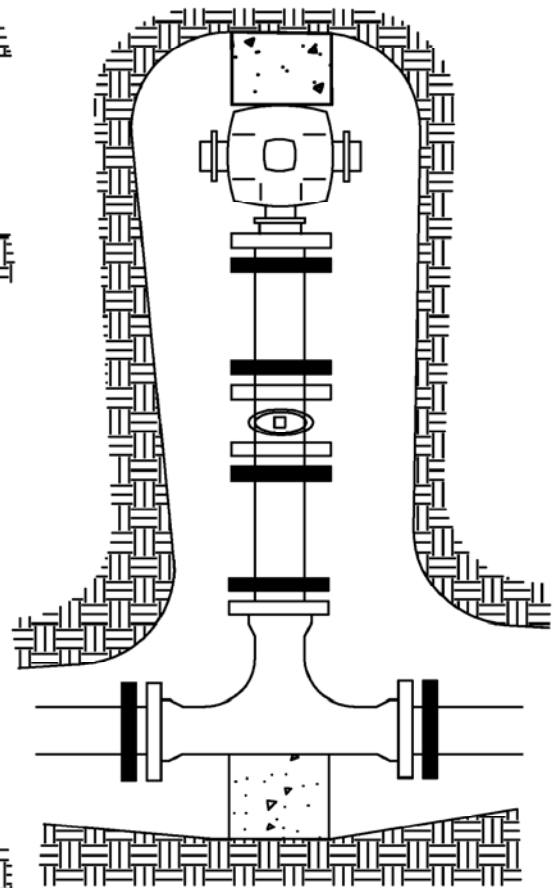
1685 CROSSTOWN BOULEVARD N.W. • ANDOVER, MINNESOTA 55304 • (763) 755-5100  
FAX (763) 755-8923 • WWW.CI.ANDOVER.MN.US

## **IRRIGATION SYSTEM PLAN REQUIREMENTS**

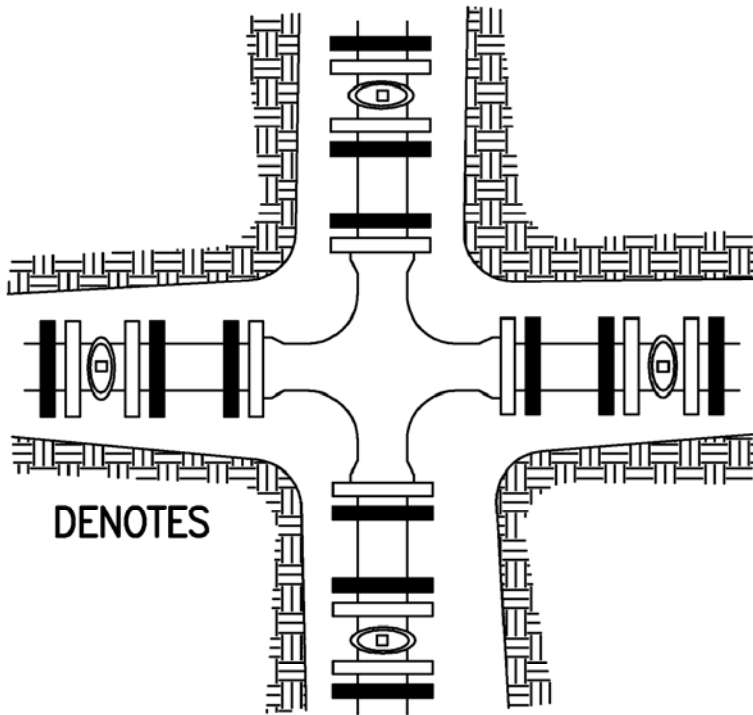
1. Include on the Landscape Plan the irrigation layout (meter enclosure locations and trunk lines).
2. City must inspect all water connections to City water system.
3. Fire Code Requirement - Cannot reduce more than 25% of the domestic water flow.
4. Meter Enclosure
  - a. A 2" curb stop must be installed outside the meter enclosure at all connections.
  - b. RPZ (Reduced Pressure Zone) is required if 1 foot elevation above the highest head cannot be achieved. Please indicate on plan the locations.
  - c. If 1 foot elevation can be achieved a PVB (Pressure Vacuum Breaker) can be installed. Please indicate on plan the locations.
5. Street Crossing Requirements – Item 14 – Irrigation lines shall be placed in SCH40 conduit pipe.
6. Please show on the plan each irrigation area relative to each water service.
7. System shall be designed to meet City irrigation restriction. Submit irrigation as per sprinkling times proposed for City review to meet odd/even sprinkling requirements.
8. The plan shall indicate the contact person regarding irrigation system.
9. Rain sensors are required on all irrigation systems and must be indicated on plan.
10. A licensed contractor shall construct water connections to the City watermain. All other connections must be installed by a master plumber as required by Code.
11. Meter box must be sized large enough to hold controller, valves, RPZ or PVB, meter, etc. Please submit drawing with plan. Extra room shall be required for maintenance.
12. Blowout of the system shall not be run through the meter.
13. If conduits are to cross City right-of-way your attorney must submit an Indemnification document for City review regarding crossing public right-of-way with an irrigation line. Language shall include hold harmless the City of Andover for any damages and the association would be responsible for repair if the City damages lines within the right-of-way. Example: Indemnification to City of Andover: The \_\_\_\_\_ Association, Inc. shall indemnify and hold harmless the City of Andover for any damages to the City infrastructure sustained during installation and/or as a result of water pipes (irrigation pipes) of the Association because water pipes of the Association run under \_\_\_\_\_ in the City of Andover. Damages include, but are not limited to, burst water pipes and access to the pipes by the Association through the street surface to repair the pipes or damage to City utilities. The indemnification cannot be altered or terminated by the Association without the written consent of the City of Andover.



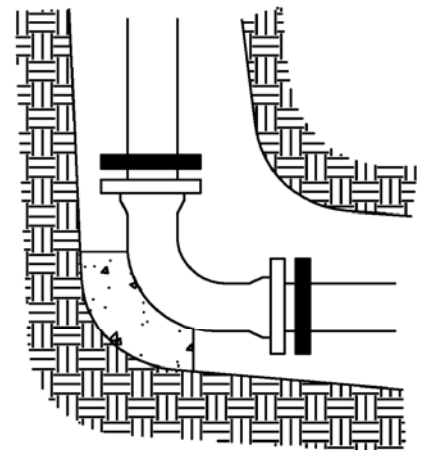
TEES



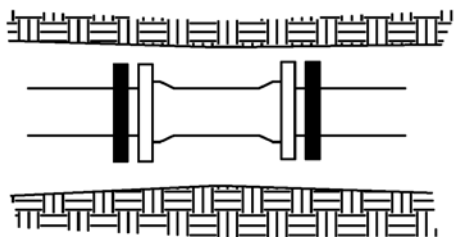
HYDRANT LEADS



DENOTES



BENDS



SLEEVES

**DENOTES  
MEGALUGS**

**NOTES:**

1. MEGALUGS TO BE USED AT ALL MECHANICAL JOINTS.
2. PLACE CONCRETE BLOCK UNDER ALL GATE VALVES AND HYDRANTS.
3. THRUST BLOCKING AT ALL TEES, BENDS, AND AT HYDRANTS.
4. ALL BOLTS, T-BOLTS, AND NUTS INSTALLED BELOW GRADE SHALL BE "Cor-Blue" OR APPROVED EQUAL (AWWA 153).

3/6/08



STANDARD DRAWING  
NO.

210