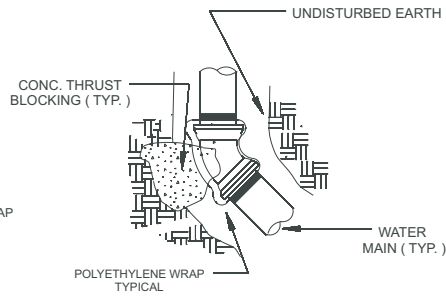
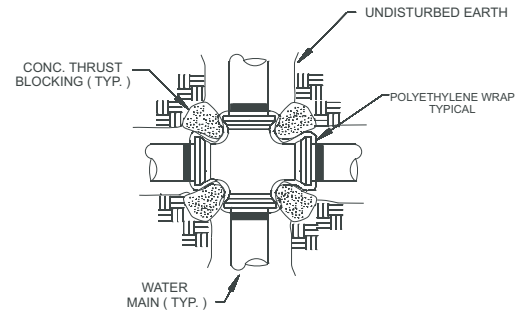


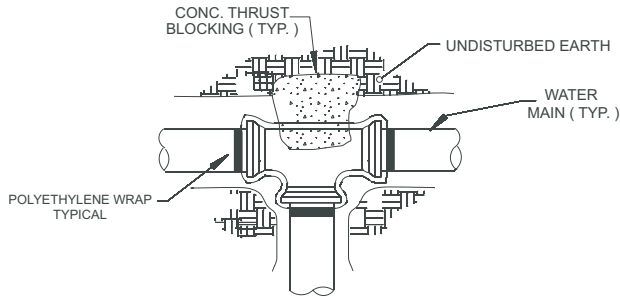
PLAN OF 90° BEND



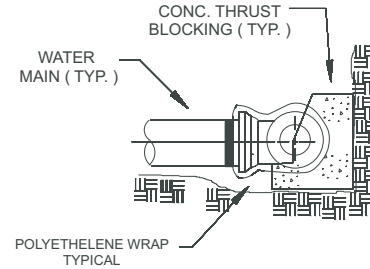
PLAN OF 45° OR 22¹/₂° BEND



PLAN OF CROSS



PLAN OF TEE



ELEVATION

THRUST / POUND OF PRESSURE

PIPE SIZE	DEAD END OR TEE	1/4 " BEND	1/8 " BEND	1/16 " BEND
4"	20	40	27	20
6"	39	60	54	29
8"	68	100	56	31
10"	110	160	89	48
12"	155	220	120	62
16"	260	340	180	90

NOTE:

ALL DUCTILE IRON PIPE, FITTINGS AND VALVES SHALL BE WRAPPED WITH A POLYETHYLENE MATERIAL, 8-MIL. INSTALLED TO THE CURRENT ADDITION OF THE AWWA C-105.

BLOCKING SHALL BE POURED AFTER THE POLYETHYLENE WRAP IS IN PLACE.

BLOCKING SHALL BE INSPECTED BY PWW AND/OR THE DESIGN ENGINEER'S INSPECTOR PRIOR TO BACKFILLING.

THRUST BLOCKS TO BE PLACED AGAINST UNDISTURBED EARTH. USE ADDITIONAL CONCRETE AS REQUIRED FOR OVER EXCAVATION.