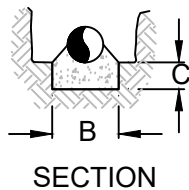
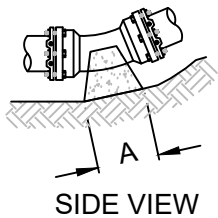


## PIPELINE CONCRETE THRUST BLOCK DATA

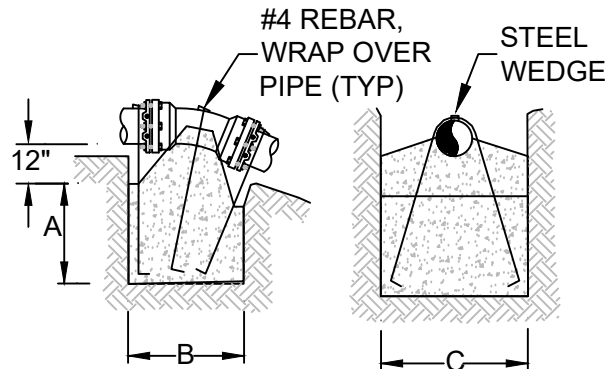
PIPE SIZE	45° BEND, UPPER VERTICAL			22 1/2° BEND, UPPER VERTICAL			11 1/4° BEND, UPPER VERTICAL			45° BEND, LOWER VERTICAL			22 1/2° BEND, LOWER VERTICAL			11 1/4° BEND, LOWER VERTICAL		
	A	B	C	A	B	C	A	B	C	A	B	C	A	B	C	A	B	C
4"-6"	1.25'	1.2'	0.6'	0.75'	1.2'	0.6'	0.5'	1.2'	0.6'	3.0'	3.0'	2.5'	1.85'	2.5'	2.0'	1.25'	2.0'	1.5'
8"	2.1'	1.5'	0.85'	1.0'	1.33'	0.67'	0.67'	1.33'	0.6'	3.25'	4.5'	3.25'	2.25'	3.25'	3.33'	1.75'	2.5'	2.0'
10"	2.1'	1.67	0.85'	1.5'	1.67	0.67'	0.85'	1.5'	0.67'	3.67'	4.75'	4.0'	2.5'	3.85'	3.67'	1.75'	2.75'	2.5'
12"	2.5'	1.85'	1.0'	1.75'	1.67	0.67'	1.0'	1.67'	0.67'	3.67'	5.0'	4.5'	2.5'	4.0'	4.0'	2.0'	3.0'	3.0'
16"	3.33'	2.5'	1.25'	2.25'	1.67'	0.75'	1.33'	2.0'	0.75'	3.67'	5.0'	4.5'	2.5'	4.0'	4.0'	2.0'	3.0'	3.0'

**NOTES:**

1. ALL CONCRETE USED FOR THRUST BLOCKS SHALL BE 2500psi STRENGTH, POURED AGAINST STABLE, COMPACTED GROUND.
2. PIPES SHALL NOT BE PRESSURIZED UNTIL AT LEAST 7 DAYS AFTER THE THRUST BLOCKS HAVE BEEN POURED.
3. THRUST BLOCKS AT REDUCING FITTINGS SHALL BE SIZED BASED UPON THE LARGER PIPE SIZE.
4. ALL FITTINGS SHALL BE SECURED TO PIPE USING MEGALUG JOINT RESTRAINTS OR APPROVED EQUAL.
5. IN LOCATIONS WITH WET OR OTHERWISE UNSTABLE GROUND, THE CONTRACTOR SHALL USE MEGALUG JOINT RESTRAINTS OR MECHANICAL JOINT FITTINGS WITH TIE RODS INSTEAD OF CONCRETE THRUST BLOCKS.
6. THE CONTRACTOR MAY ELECT TO USE MECHANICAL JOINT RESTRAINTS IN LIEU OF CONCRETE THRUST BLOCKS. MECHANICAL JOINT RESTRAINTS SHALL BE SERIES 1100 MEGALUG RESTRAINTS OR APPROVED EQUAL FOR DUCTILE IRON PIPE OR SERIES 2000 PV MEGALUG RESTRAINTS OR APPROVED EQUAL FOR PVC PIPE. MECHANICAL JOINT RESTRAINTS SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER RECOMMENDATIONS & THE APPROPRIATE STANDARD DETAIL.



**UPPER VERTICAL BENDS**



**LOWER VERTICAL BENDS**