

SCHEDULE FOR THRUST BLOCK AREAS *								
PIPE SIZE (INCHES)	90 BEND (SQ FT)	45 BEND (SQ FT)	22-1/2 BEND (SQ FT)	11-1/4 BEND (SQ FT)	TEE & PLUG (SQ FT)	CROSS (SQ FT)	WYE (SQ FT)	DESIGN PRESS (PSI)
4	3,840	2,087	1,059	533	2,715	N/A	N/A	150
6	7,932	4,293	2,189	1,100	5,609	N/A	N/A	150
8	13,644	7,385	3,754	1,892	9,648	N/A	N/A	150
10	20,528	11,111	5,663	2,846	14,516	N/A	N/A	150
12	29,030	15,711	8,009	4,025	20,528	N/A	N/A	150
16	50,442	27,300	13,914	6,992	35,669	N/A	N/A	150
18	59,111	31,922	16,305	8,782	41,798	N/A	N/A	150

NOTE: THRUST BLOCK AREAS TO BE COMPUTED ON BASIS OF LBS. PER SQ. FT. SOIL RESTRAINT BEARING.

3,000  
(1,500 MIN)  
SEE NOTE 5

\* TO BE COMPLETED BY ENGINEER.

NOTES:

- 1.) FITTINGS SHALL BE RESTRAINED JOINTS UNLESS OTHERWISE INDICATED.
- 2.) INSTALL FULL LENGTH JOINTS WITH TOTAL LENGTH EQUAL TO OR GREATER THAN SHOWN IN THE TABLE.
- 3.) IN LINE VALVES AND THROUGH RUN OF TEES OUTSIDE LIMITS OF RESTRAINED JOINTS FROM OTHER FITTINGS NEED NOT BE OF RESTRAINED JOINTS FROM OTHER FITTINGS RESTRAINED UNLESS OTHERWISE INDICATED.
- 4.) LENGTHS SHOWN IN THE TABLE HAVE BEEN CALCULATED IN ACCORDANCE WITH THE PROCEDURE OUTLINED IN "THRUST RESTRAINT DESIGN FOR DUCTILE IRON PIPE" AS PUBLISHED BY DIPRA, WITH THE FOLLOWING ASSUMPTIONS: WORKING PRESSURE: \_\_\_\_\_ P.S.I.\* SOIL DESIGNATION: \_\_\_\_\_ \* LAYING CONDITIONS: \_\_\_\_\_ \*
- 5.) FOR PIPE ENCASED IN POLYETHYLENE, USE VALUES GIVEN IN PARENTHESES OR INCREASE THE GIVEN VALUE BY A FACTOR OF 1.5. \* TO BE COMPLETED BY THE ENGINEER.

CITY OF P.C.B. UTILITIES DEPARTMENT		THRUST BLOCK SCHEDULE	M-5
REV.	DATE		
1	MAR '12		
		..... DATE OF APPROVAL	