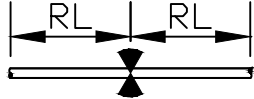
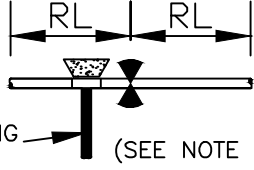
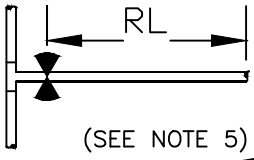
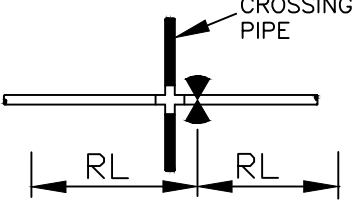
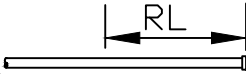


# RESTRAINED LENGTH IN FEET

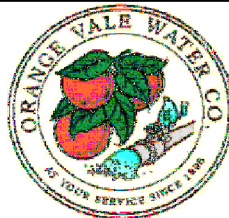
PIPE CONFIGURATION	CROSSING PIPE SIZE	DEPTH OF 36"							
		6"		8"		10"		12"	
		DIP	PVC	DIP	PVC	DIP	PVC	DIP	PVC
IN LINE VALVE 		38	45	58	70	X	X	X	X
VALVE AT TEE  INTERSECTING PIPE (SEE NOTE 4)	6"	6	17	13	37	48	X	X	X
	8"	6	12	8	27	19	43	X	X
	10"	6	6	6	19	15	39	X	X
	12"	6	6	6	14	10	32	X	X
TEE W/O THRUST BLOCK  (SEE NOTE 5)	6"	6	18	15	41	50	X	X	X
	8"	6	16	12	32	20	44	X	X
VALVE AT CROSS  CROSSING PIPE	10"	6	6	6	20	17	40	X	X
	12"	6	6	6	18	14	34	X	X
	6"	64	84	100	118	X	X	X	X
DEAD END W/O THRUST BLOCK (SEE NOTE 5) 		64	84	100	118	X	X	X	X

RL = RESTRAINED LENGTH

**NOTES:**

- 1) ALL JOINTS WITHIN THE RESTRAINED LENGTH SHALL BE RESTRAINED.
- 2) RESTRAINED DEVICES FOR MJ'S: FOR DUCTILE IRON USE EBAA MEGALUG 1100, STAR PIPE PRODUCTS STARGRIP 3000, OR SIGMA ONE LOK SLD; FOR PVC PIPE USE EBAA 2000PV, OR STAR PIPE PRODUCTS ALLGRIP 3600.
- 3) RESTRAINING DEVICES FOR PUSH-ON JOINTS: FOR DUCTILE IRON USE U.S. PIPE FIELD LOK GASKETS, U.S. PIPE TR FLEX PIPE, OR APPROVED EQUAL; RESTRAINED PVC PUSH-ON JOINTS NOT ALLOWED, USE DUCTILE IRON PIPE ONLY FOR RESTRAINED PUSH-ON JOINTS.
- 4) IF THRUST BLOCK IS NOT INSTALLED BEHIND TEE, RESTRAINED LENGTH SHALL BE APPROVED BY OVWC.
- 5) THIS CONFIGURATION ALLOWED ONLY IF A THRUST BLOCK CANNOT BE INSTALLED BEHIND THE TEE/DEAD END IN ACCORDANCE WITH OV-3. IF THRUST BLOCK IS INSTALLED, RESTRAINED LENGTH NOT REQUIRED.
- 6) JOINTS ON CROSSING PIPES SHALL BE RESTRAINED FOR MINIMUM 18 FEET IN EACH DIRECTION.
- 7) RESTRAINED LENGTHS ARE BASED ON 150 PSI PRESSURE. IF HIGHER PRESSURES OR HIGHER SURGES ARE ANTICIPATED, THIS TABLE DOSE NOT APPLY AND RESTRAINED LENGTHS SHALL BE APPROVED BY OVWC.

**ORANGE VALE WATER COMPANY**



**PIPE RESTRAINED LENGTH**

SCALE: NONE  
DATE: 05/12

**OV- 4**