

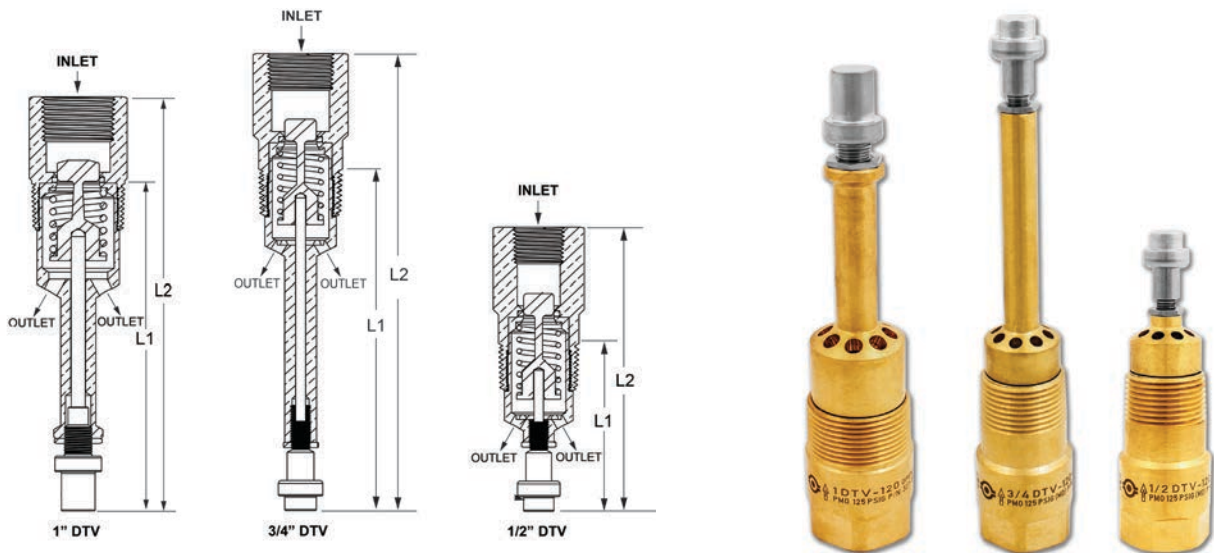
Drain Tempering Valve (DTV) SUBMITTAL

JOB:	ORDER NO:	DATE:
	SUBMITTED BY:	DATE:
UNIT TAG:	APPROVED BY:	DATE:
CITY:	ENGINEER:	BUILDING TYPE:
STATE:	CONTRACTOR:	CONSTRUCTION TYPE:
COMPLETION DATE:		

DESCRIPTION

The DTV, or Drain Tempering Valve, is a self-operating thermostatic valve installed to monitor drain effluent temperatures and automatically temper effluent down to code-compliant limits before entering a public sewer or drain system. This prevents fines, damages, and business interruptions due to over-temperature effluent.

DIMENSIONS

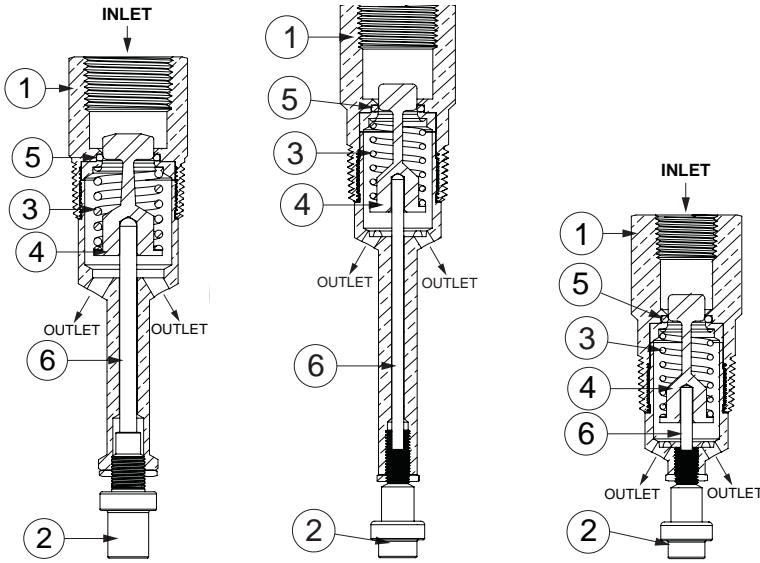


DTV Size	Size (NPT)		Length 1 (L1)		Length 2 (L2)		Weight		Cv	Max. Pressure		Max. Temp.	
	Cold Water Inlet	Drain Connection	IN	MM	IN	MM	LBS.	KG		PSIG	BAR	°F	°C
DTV-1/2-XXX	1/2"	1"	2.9	73	4.9	124	1.1	0.5	2.0	125	8.6	250	121
DTV-3/4-XXX	3/4"	1"	5.9	149	7.9	200	1.2	0.5	2.0				
DTV-1-XXX	1"	1-1/4"	5.8	148	7.4	187	1.5	0.7	4.0				

Model Number Selection

XXX refers to the desired open temperature. When the water temperature rises above this temperature the DTV will begin to open, allowing cold water to enter the line and temper the overheated effluent until it falls back below the valve's set-point. The valve size will depend on your system's Cv and cold water inlet size. For example, if you want the valve to open at 120°F, you need a Cv of 2.0, and the DTV is to be installed on a 3/4" cold water line, the model number would be DTV-3/4-120.

DIMENSIONS



ITEM	DESCRIPTION	MATERIAL
1	Valve Body	Brass or 300 Series SS
2	Thermal Actuator	300 Series SS
3	Operating Spring	300 Series SS
4	Ram-Type Plug	300 Series SS
5	Seat Seal	PTFE
6	Piston	300 Series SS

TYPICAL SPECIFICATION

If installed and maintained as recommended, the ThermOmegaTech® DTV will yield reliable and trouble-free service. **IMPORTANT:** Before installation, please read and understand these instructions.

REMEMBER: These valves are full open at its stated temperature and full closed approximately 10°F lower. A #20 mesh strainer is recommended where needed.

NOTE: IF ANY TYPE OF CHECK VALVE OR BACKFLOW PREVENTER IS USED, A WATER HAMMER ARRESTOR MUST BE INSTALLED BETWEEN THE DTV WATER INLET AND THE CHECK VALVE/BACKFLOW PREVENTER. FAILURE TO DO SO MAY CAUSE PERMANENT DAMAGE TO THE VALVE AND VOID THE WARRANTY.

NOTE: MAXIMUM ALLOWABLE TEMPERATURE OF SENSING ACTUATOR IS 250°F (121°C).

- I. The DTV is a self-operating, temperature actuated valve designed to respond to elevated drain temperature and allow cold water to flow into the drain to keep the drain effluent below the maximum allowable temperature.
- II. The DTV should typically be installed as close to the outlet of the “hot source” as possible in order to allow the cold water to fully mix before running down the drain.
- III. The DTV is installed with the thermal actuator end inserted into the drain line and the cold water inlet connected to the valve’s ½”, ¾”, or 1” NPT female threaded connection.
- IV. **CAUTION: MAKE SURE THAT THE WATER INLET FITTING INSTALLED INTO DTV HAS A LARGE ENOUGH I.D. AND SHORT ENOUGH LENGTH SO IT DOES NOT INTERFERE WITH VALVE PLUG MOVEMENT.**
Cold water inlet fitting must have the following minimum I.D. to avoid interference with valve movement:
½” DTV: 0.622 in (15.8 mm) ¾” DTV: 0.69 in (17.5 mm) 1” DTV: 1.044 in. (26.5 mm)
- V. Ensure that the thermal actuator end does not touch the opposite side of the fitting.
- VI. To assure adequate response and cold water flow, especially in low flow applications, the thermal actuator should be installed so that even the minimum hot effluent flow fully wets the actuator end of the valve.
- VII. Check local plumbing codes as to the type of check valve or backflow preventer that may be required.