

# 2510 VALVE

## HIGH PERFORMANCE CONTROL VALVE



TESTED and CERTIFIED by the WQA to NSF/ANSI Standard 44 for Water Softener Performance.



TESTED and CERTIFIED by the WQA to NSF/ANSI Standard 372 for Lead Free Compliance.



UL recognized to 979



Restriction of Hazardous Substance Compliant

### FEATURES • BENEFITS

- ◆ Fiber-reinforced polymer valve body for superior strength and durability, non-corrosive, and UV-resistant
- ◆ Continuous service flow rate of 19 GPM with a backwash of 17 GPM
- ◆ Backwash capability accommodates softener tanks up to 16" and filters up to 16" in diameter
- ◆ Fully adjustable 3- or 5-cycle control for efficient and reliable water treatment system operation
- ◆ Time-tested, hydraulically-balanced piston for service and regeneration
- ◆ Rugged-built electromechanical timer designed with heavy duty 3/8" wide plastic gears

### AIO FEATURES • BENEFITS

- ◆ No chemical additives or air compressors are required for operation
- ◆ Utilizes an air injection system to remove iron (ferrous or clear water), manganese, and sulfur from the water via both oxidation and filtration
- ◆ Pre-coated plastic piston for friction and corrosion resistance
- ◆ AIO product is not certified
- ◆ Available with SXT controller only

### OPTIONS

- ◆ Filter, AIO, or softener control valves
- ◆ No hard water bypass piston
- ◆ Brine cam auxiliary switch
- ◆ Electromechanical timer auxiliary switch
- ◆ Plumbing connections in 3/4" to 1-1/4" NPT, BSP, and sweat
- ◆ Fiber-reinforced polymer or stainless steel bypass valve
- ◆ Electromechanical 7- or 12-day time clock, meter delayed, or meter immediate regeneration
- ◆ Manual lever operations
- ◆ **SXT** - Large LCD display and user-selectable time clock or metered function; usable for filtration, softener systems, and AIO
- ◆ **XT**- Offers a two-line, 16 character LCD backlit display for easy entering of master and user programming as well as view of diagnostics
- ◆ **Electromechanical Timer**- Simple to adjust and easy to service with quick access to all internal components

## VALVE SPECIFICATIONS

Valve Material	Fiber-reinforced polymer
Inlet/Outlet	3/4", 1", or 1-1/4" NPT/BSP/Sweat
Cycles	3 or 5

## FLOW RATES (50 PSI INLET) – VALVE ALONE

Continuous 15 psi (1.0 bar) drop	19 GPM (4.3 m <sup>3</sup> /h)
Peak 25 psi (1.7 bar) drop	24 GPM (5.5 m <sup>3</sup> /h)
Cv flow at 1 psi	4.8
Max. Backwash 25 psi	17 GPM (3.9 m <sup>3</sup> /h)

## REGENERATION

Downflow/Upflow	Downflow only
Adjustable Cycles	Yes
Timer Available	
Electromechanical:	0 - 164 min/regeneration
SXT:	0 - 199 min/cycle
XT:	0 - 240 min/cycle

## METER INFORMATION

Meter Accuracy	
3/4" Paddle/Turbine:	0.25 - 15 GPM ± 5% (0.06 - 3 m <sup>3</sup> /h)
1-1/2" Paddle:	1.5 - 75 GPM ± 5% (5.7 - 283.9 LPM)
Meter Capacity Range	
3/4" Standard:	125 - 2,125 gal (0.5 - 8 m <sup>3</sup> )
3/4" Extended:	625 - 10,625 gal (2.5 - 40 m <sup>3</sup> )
SXT:	1 - 999,900 gal (0 - 3,785 m <sup>3</sup> )
XT:	1,000 - 9,900,000 gal (3.8 - 37,476 m <sup>3</sup> )

AIO - Meter not included

## DIMENSIONS

Distributor Pilot	1.05" O.D. (26.7 mm)
1-1/2" EM Extended:	1/2" NPTF Quick-Connect
Brine Valve	
1600:	3/8"
Injector System	1600, 1650
Mounting Base	2.5" - 8 NPSM
Height from Top of Tank	7.5" (191 mm)
Riser Tube Diameter	3/4" (19 mm)
Riser Height	1/4" Below top of tank

## TYPICAL APPLICATIONS

Water Softener	6 - 16" diameter
Filters (including AIO)	8 - 16" diameter based on 10 GPM/ft2

## ADDITIONAL INFORMATION

Electrical Rating	24/110/220V 50/60 Hz
Estimated Shipping Weight	
Time Clock:	7 lbs
Metered Valve:	10 lbs
Pressure	
Hydrostatic:	300 psi (20 bar)
Working:	20 - 125 psi (1.4 - 8.5 bar)
Working (AIO Only):	20 - 80 psi (1.4 - 5.5 bar)
Temperature	
Cold Water Valve:	34 - 110°F (1 - 43°C)



13845 Bishops Dr. | Suite 200 | Brookfield, WI 53005 | United States  
P: 262.238.4400 | Customer Care: 800.279.9404 | [tech-support@pentair.com](mailto:tech-support@pentair.com)

§For a detailed list of where Pentair trademarks are registered, please visit [waterpurification.pentair.com/brands](http://waterpurification.pentair.com/brands). Pentair trademarks and logos are owned by Pentair plc or its affiliates. Third party registered and unregistered trademarks and logos are the property of their respective owners.

© 2018 Pentair Residential Filtration, LLC. All rights reserved.  
40729 Rev E AU18