

## Model ST7017 (Omega)

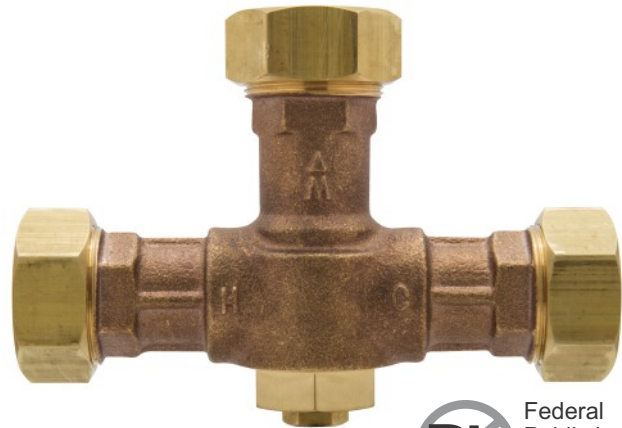
### Lead-Free Thermostatic Mixing Valve

#### APPLICATION:

The model ST7017 is an ASSE 1070 and ASSE 1017 certified, Lead-Free Thermostatic Mixing Valve that protects against dangerously hot water in any Tub, Sink and/or Lavatory applications. This Valve can be used with any type of Faucet for maximum flexibility and can accommodate up to 48 hand washing stations having a 0.5 GPM flow rate. Compliant with the temperature control requirements of ASSE 1017 and ASSE 1070 at all flow rates well below the ASSE standard tested flow rate. The ST7017 can safely deliver controlled tempered hot water to all your fixtures, at all times.

#### FEATURES:

- ✦ Lead-Free DZR brass body with corrosion-resistant and Lead-Free internal components
- Integral cartridge-style Checks to prevent cross-flow and Strainers to filter debris from entering the Valve
- Temperature adjustment is made using an Allen wrench. A Locknut on the Bonnet prevents unauthorized or accidental temperature adjustment
- Commercial quality paraffin Thermal Actuator provides repeatable, reliable performance
- Factory set to 105°F (41°C) and field adjustable
- IAPMO certified to ASSE 1070 down to 0.25 GPM (1.0 LPM) within ± 7°F (5.5°C)
- IAPMO certified to ASSE 1017 down to 0.25 GPM (1.0 LPM)
- The ST7017 is capable of exceeding the temperature control accuracy requirements of ASSE 1070 and 1017 at all flow requirements without requiring a continuously Recirculating Pump



ST7017



Patent #9,898,017

#### SPECIFICATIONS:

##### Valve Specifications:

Maximum Operating Pressure: ..... 125 PSI (861 kPa)  
 Flow Rate @ 45 PSI (310 kPa) differential:  
 Flow Rate: ..... 24 GPM (91 LPM)  
 Minimum Flow Rate\*: ..... 0.25 GPM (1.0 LPM)  
 Maximum Hot Water Temp: ..... 180°F (82°C)  
 Minimum Hot Water Supply Temp\*\*: ..... 5°F (3°C)  
 Above Set Point  
 Maximum Cold Water Supply Temp\*\*: ..... 5°F (3°C)  
 Below Set Point  
 Minimum Cold Water Temp: ..... 39°F (4°C)  
 Temperature Range\*: ..... 95°F-130°F (35°C-54°C)  
 Connections Available ..... 1/2" & 3/4"

\* In accordance with ASSE 1070 and ASSE 1017 as certified by IAPMO  
 \*\* Under Normal Operating Conditions  
 ✦ The wetted surface of these valves contacted by consumable water contains less than 0.25% of lead by weight in conformance with national Lead-Free law.

#### GUIDE SPECIFICATION:

The Thermostatic Mixing Valve shall be independent lab certified per ASSE 1070, ASSE 1017 and CSA B125.3 at 0.25 GPM. Valve shall have a Lead-Free Brass Body and Bonnet along with corrosion-resistant internal components. It shall include Integral Checks with Screens to prevent backflow and to filter debris from entering the Valve. Temperature adjustment shall be made using an Allen wrench and a Locknut on the Bonnet to prevent unauthorized or accidental temperature adjustment. Valve shall provide 24 GPM (91 LPM) capacity at 45 PSI (310 kPa) differential. Temperature range shall be 95°F-130°F (35°C-54°C). Valve shall be **CONTROLS®** model ST7017.

PRESSURE DROP PSID (KPA)	CV	5 (34)	10 (69)	15 (103)	20 (138)	30 (207)	45 (310)	60 (414)
1/2" TUBE FLOW RATE GPM (LPM)	2.8	6 (22.7)	9 (34)	11 (41.6)	13 (49.2)	15 (56.8)	19 (72)	22 (83.3)
3/4" TUBE FLOW RATE GPM (LPM)	3.2	7 (26.5)	10 (37.9)	12 (45.4)	14 (53)	18 (68.1)	21 (79.5)	25 (94.6)

<p>CONTROLS® assumes no responsibility for use of void or superseded data.                  CONTROLS®, Lake Bluff, IL, a member of Morris Group International®.                  Please visit <a href="http://www.WaterControlValves.com">www.WaterControlValves.com</a> for most current specifications.</p> <p>Submission # <b>ST7017</b>                  Revised: 10/28/2022</p>	<p><b>Certifications:</b></p>  <p>ASSE 1070                  ASSE 1017                  CSA B125.3</p>	 <p>Member of Morris Group International®</p> <p style="text-align: right;"><b>CONTROLS®</b>                  42 Sherwood Terrace, Suite #5                  Lake Bluff, IL 60044                  Phone: (847) 604-4773  <a href="http://www.WaterControlValves.com">www.WaterControlValves.com</a></p>
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## VALVE SELECTION:

### Copper Tube (Sweat)

- ST7017-12CU Brass Valve Body With Kit for 1/2" Copper Tube
- ST7017-34CU Brass Valve Body With Kit for 3/4" Copper Tube

### Threaded Pipe

- ST7017-12FNPT Brass Valve Body 1/2" NPT (Female)
- ST7017-34FNPT Brass Valve Body 3/4" NPT (Female)

### PEX Pipe

- ST7017-12PEX Brass Valve Body 1/2" PEX Tubing
- ST7017-34PEX Brass Valve Body 3/4" PEX Tubing

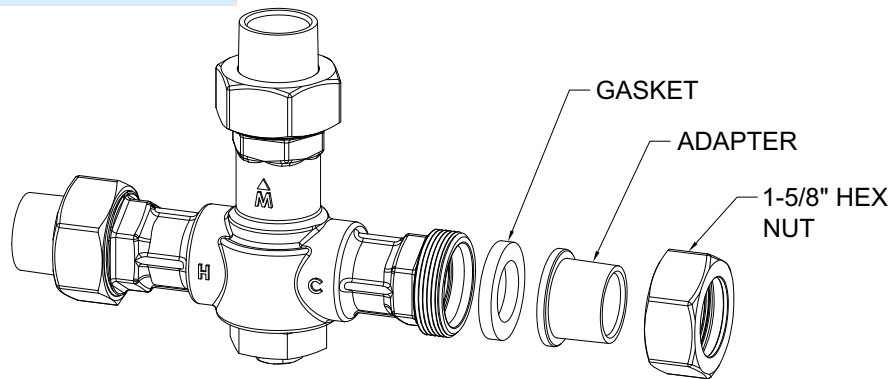
### PVC Pipe

- ST7017-12CPVC Brass Valve Body With Kit for 1/2" PVC
- ST7017-34CPVC Brass Valve Body With Kit for 3/4" PVC

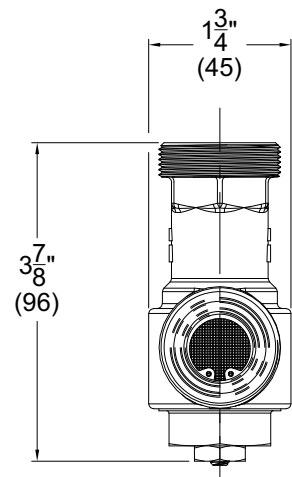
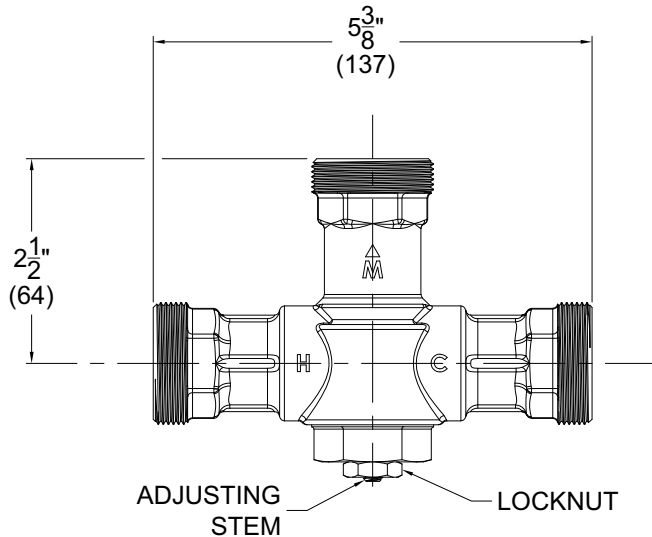
### Press Fit Pipe

- ST7017-12PF Brass Valve Body 1/2" Press Fit
- ST7017-34PF Brass Valve Body 3/4" Press Fit
- ST7017-1PF Brass Valve Body 1" Press Fit

## TECHNICAL DIMENSIONS:



ST7017-34CPVC, SHOWN  
DETAIL NOT TO SCALE



ST7017

# **ST7017** Revised: 10/28/2022

**⚠ WARNING: Cancer and Reproductive Harm - www.P65Warnings.ca.gov**

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<b>SELECTION SUMMARY &amp; APPROVAL FOR MANUFACTURING</b>	Model Number & Options _____	Quantity _____
	Company _____	
	Contact _____	Title _____
	Signature (Approval for Manufacturing) _____	Date _____
	<p>Member of Morris Group International®  <b>CONTROLS</b>®                  42 Sherwood Terrace, Suite #5                  Lake Bluff, IL 60044                  Phone: (847) 604-4773  <a href="http://www.WaterControlValves.com">www.WaterControlValves.com</a></p>	