

**For Non-Health Hazard Applications**

Job Name \_\_\_\_\_  
 Job Location \_\_\_\_\_  
 Engineer \_\_\_\_\_  
 Approval \_\_\_\_\_

Contractor \_\_\_\_\_  
 Approval \_\_\_\_\_  
 Contractor's P.O. No. \_\_\_\_\_  
 Representative \_\_\_\_\_

**LEAD FREE\***

# HydroGuard® T/P Series e700

**Description**

The Series e700 HydroGuard® T/P automatically mixes hot and cold water to deliver blended water within a specified range. Using an advanced thermal actuator, the Series e700 quickly compensates for temperature fluctuations induced by water temperature and pressure changes. In the event of cold water failure, the thermostatic motor virtually shuts off the flow of hot water. HydroGuard T/P meets the most stringent performance criteria for temperature and pressure changes, defined by ASSE 1016 (Type T/P).

Featuring heavy, cast-brass construction and an adjustable brass to brass high limit temperature stop, self-contained cartridge, corrosion resistant internal component, integral checks, and back to back shallow wall installation capability. All parts of the e700 Series valve are accessible from the front of the valve. All Series e700 valves open in the cold water position to ensure maximum bather safety and comfort.

The accuracy, reliability and water economy of the Series e700 HydroGuard T/P make it preferable for applications that require precise, consistent water control: showers, baths, hospital hydrotherapy and residential areas.

All e700 valves meet the Americans with Disabilities Act (ADA).

**Specifications**

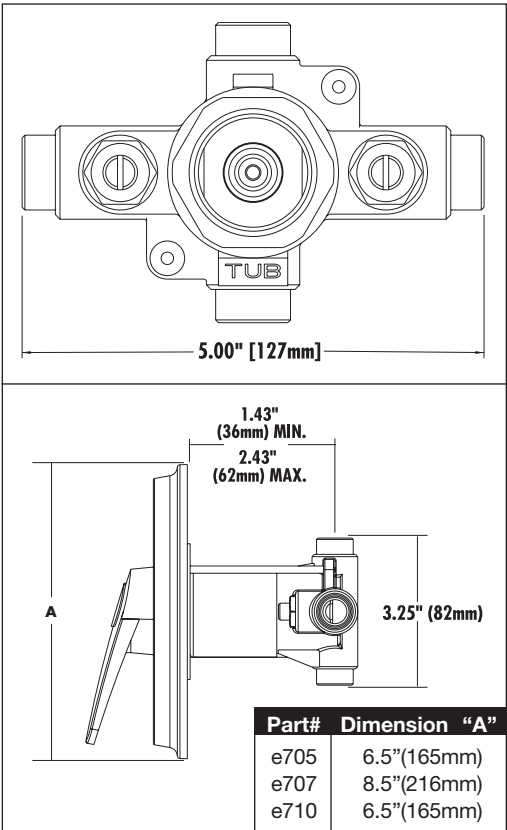
- Valve Construction ..... Combination mixing valve, with heavy cast bronze body and brass stem. Concealed adjustable high temperature limit stop. Available with ADA-compliant ABS or metal lever handle.
- Connections ..... ½" Sweat Inlet/Outlet
- Capacity ..... 4 gpm @ 45 psi ΔP 50/50 mix
- Maximum Hot Water Supply Temperature ..... 190°F (88°C)
- Minimum Hot Water Supply Temperature (Approach Temperature) ..... 10°F (5.5°C) Above Set Point
- Maximum Operating Pressure ..... 125 psig (862 kPa)
- Temperature Ranges ..... ASSE 1016 Type T/P — 90 – 110°F (32 – 43°C)  
 ASSE 1016 Type T — 80 – 120°F (27 – 49°C)
- High Temperature Limit Stop ..... Adjustable (factory set at 110°F [43°C])
- Maximum Static Pressure ..... 125 psig (862 kPa)
- Minimum Flow ..... 1.0 gpm (3.781 L/min)
- Approval Standards ..... CSA B125.1, ASSE 1016, T/P  
 ..... ASME A/12.18.1
- Listing ..... ASSE 1016, IAPMO cUPC
- Shipping Weight ..... 3.5 lbs. (1.6 kg)

All HydroGuard T/P Series e700 combination mixing valves meet above performance specifications based on typical operating conditions as stated in ASSE 1016 (45 psi pressure differential, hot water supply between 140° – 180°F (60° – 82°C), cold water supply less than 70°F (21°C)).

If your operating conditions vary from those stated in the standard, performance may vary as well. Consult your local sales representative or a Powers factory engineer to discuss your specific application. All Powers thermostatic mixing valves perform to the requirements of standards ASSE 1016 and CSA B125.



**Dimensions**



Powers product specifications in U.S. customary units and metric are approximate and are provided for reference only. For precise measurements, please contact Powers Technical Service. Powers reserves the right to change or modify product design, construction, specifications, or materials without prior notice and without incurring any obligation to make such changes and modifications on Powers products previously or subsequently sold.

## How To Specify e700 Valves for Shower and Tub/Shower Systems

	Wt.	Order Code							
Valves									
ABS Trim .....	3.5	e705							
Metal Trim .....	3.5	e710							
Flat Metal Trim .....	3.5	e707							
Showerheads									
Economizer, Chrome-Plated ABS, Adjustable .....	0.5	J							
Standard, Chrome-Plated Brass .....	0.9	K							
Deluxe, Chrome-Plated Brass .....	1.3	M							
Low Flow, (1.5 gpm) Chrome Plated .....	2.5	G							
Low Flow, (1.5 gpm) Chrome Plated .....	0.5	H							
Arm and Flange Kits									
Standard Arm and Flange .....	0.3	1							
Deluxe Arm and Flange .....	0.4	2							
Standard Arm, Flange and High Temp Shutoff .....	0.6	4							
Deluxe Arm, Flange and Hi-Temp Shutoff .....	0.7	5							
Tub Spouts									
Diverter, Chrome-Plated Brass, 3/4" IPS .....	1.2	Q							
Non-Diverter, Chrome-Plated, 1/2" IPS .....	0.4	R							
Diverter, Chrome-Plated, 1/2" IPS .....	0.7	S							
Diverter, Chrome-Plated Brass, 1/2" IPS .....	1.3	T							
Diverter, Chrome-Plated, 1/2" Slipfit .....	1.0	U							
Hand Shower Systems									
24" Chrome ADA Wall Grab Bar System .....	4.7	1							
36" Chrome ADA Wall Grab Bar System .....	5.5	2							
Deluxe, Metal Hose, 30" Slide Bar .....	3.5	3							
Professional, Vinyl Hose, 30" Slide Bar .....	2.7	4							
Standard, Metal Hose, Two Wall Hooks .....	2.0	5							
Deluxe, Metal Hose, 24" Slide Bar .....	3.1	6							
Professional, Vinyl Hose, 24" Slide Bar .....	2.3	7							
Standard Plus, Metal Hose, 24" Slide Bar .....	3.0	8							
European, Metal Hose, 23" Slide Bar .....	2.0	9							
Low Flow (1.5 gpm), Metal Hose, 30" Glide Rail .....	2.8	L							
Professional Metal Hose 30" Glide Rail .....	2.8	N							
Diverter									
Concealed Diverter Valve, Metal Handle, 1/2" Sweat .....	3.0	Y							
Diverter, concealed Deluxe ABS Handle, 1/2" Sweat .....	3.0	A							
Diverter, concealed Deluxe Metal Handle, 1/2" Sweat .....	3.0	B							
Exposed Diverter, Shower Arm-Type, Chrome-Plated .....	0.5	Z							
Vacuum Breakers									
Vacuum Breaker, Elevated, Chrome-Plated .....	2.0	V							
Vacuum Breaker, In-Line .....	1.0	W							

### Typical Specification

Valve shall meet the performance requirements of ASSE 1016, Type T/P compensating for 50% fluctuation in supply line pressure, and compensate for increases in hot water supply temperature.

Valve shall be capable of supplying mixed water temperature within 10°F of hot water supply temperature. Valve shall contain a powerful, paraffin-based thermal actuator and feature a self-contained cartridge design for ease of repair and maintenance.

Water tempering valve shall not be subject to failure due to the lime build-up or dirt particles. Construction shall be conducive to long lasting, trouble free life, and shall not have close fitting, sliding parts, which through wear or binding, may impair operation.

Valve shall have all cast bronze housing and a capacity of 4 gpm at 45 psig. Valve shall include an adjustable limit stop, factory set at 110°F. Valve shall always open through cold water to maximize bather safety.

Valve shall be Powers # e7xx. Any alternates must have written approval prior to bidding.

# POWERS™

A WATTS Brand

USA: Tel: (800) 669-5430 • Fax: (847) 229-0526 • PowersControls.com  
 Canada: Tel: (905) 332-4090 • Fax: (905) 332-7068 • PowersControls.ca  
 Latin America: Tel: (52) 81-1001-8600 • PowersControls.com