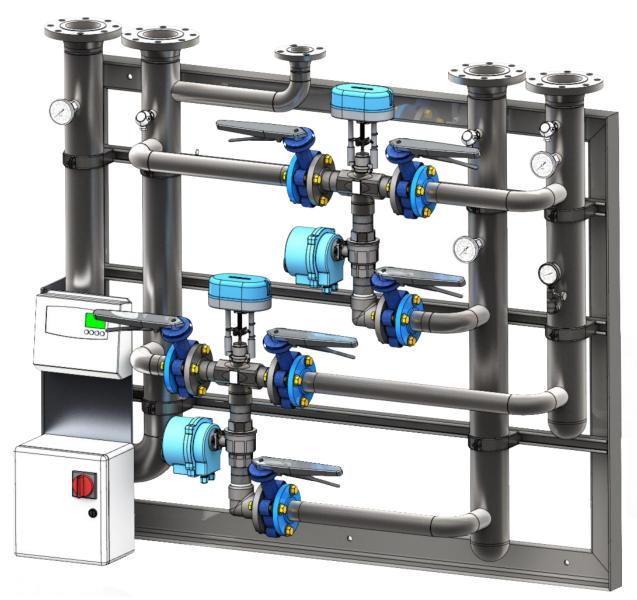
## FLOW THERM Systems

## **Temperfect**









## Why Temperfect?

The Temperfect thermostatic mixing station offers engineers and contractors a low-cost alternative to solve jobsite issues that can occur during mixing valve installation. These pre-piped stations come complete with all piping and fittings necessary to ensure proper circulation and control for the Heat-Timer ETV mixing valve. Included in the package are the Heat-Timer ETV thermostatic mixing valves, actuators, controller, safety valves and sensors required for operation. Have site-specific needs? That's our specialty. Our engineers will work with your team to find creative and efficient solutions to customize any job.

#### **Features and benefits:**

**Quick startup** – Single setpoint input, no multiple valve settings or balancing required

**Simple, accessible control settings** – No laptop or dedicated software required

**Remote communication options** – BACnet (IP or MSTP) or ModBus

#### Designed for critical temperature control -

Accurately maintains set point from 0.5 gpm domestic draw to full flow and maintains setpoint within +/-2 °F

**Smart calibration** – Prevents motor damage due to over-torque conditions. One motor fits all sizes

**7 Day scheduling with 4 daily setbacks** – Allows for a setback schedule to lower setpoint in off hours, or to raise setpoint during "sanitize" mode

**Prioritized safety** – Automatic hot water safety shutoff upon hot water inlet supply over temp. Assembled and tested in our manufacturing facility

**Stainless steel valve bodies** – Rugged body design minimizes scale build up and conforms to lead-free requirements

**Multi-applicational** – Industrial, commercial and institutional use

**External mounting to valve body** – Eliminates the potential for motor-to-water contact or the need for gasket maintenance or replacement

External mounting to valve body - 120V/1Φ

Standards and Certifications – ASSE 1017

- NSF/ASNSI 61 Sec 8

- CSA B 125.3

- UL

### **Technical Data**

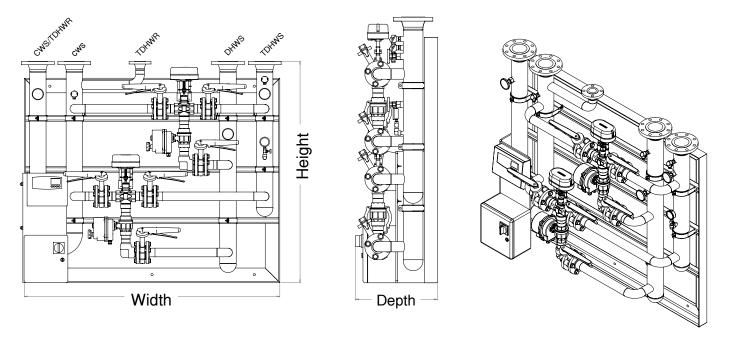
Model	Flow <sup>1</sup>	$\mathbf{C}_{\mathbf{V}}$	Width	Height	Depth	Mains <sup>2,3</sup>	Recirc <sup>2,3</sup>	Min. Re- circ	Valve(s)	Weight
	GPM	GPM	in.	in.	in.	NPS	NPS	GPM	in.	lbs.
TP115	64	29	54	42	16	2	1.5	10	1.5	100
TP120	103	46	54	42	16	2.5	1.5	15	2	120
TP125	162	73	54	42	16	3	1.5	15	2.5	130
TP210	52	24	70	56	18	2	1	5	1	200
TP215	128	58	70	56	18	3	1.5	10	1.5	200
TP220	206	92	70	56	18	4	2	15	2	300

- 1. A 5 psi pressure drop across the system at design flow is recommended for optimal performance
- 2. Connections 1.5" and larger are ANSI class 150 weld neck flanges
- 3. Connections under 1.5" are MNPT

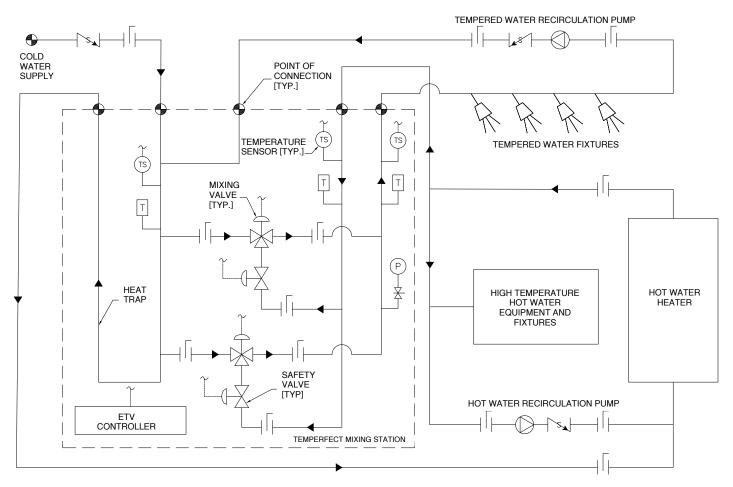
Notes: To calculate pressure drop at a given flowrate:  $dP=(Q/Cv)^2$ FLA < 10 amps depending on options, protect with 15 amp circuit breaker



## **Drawings**



## **Typical Piping Arrangement**



Domestic Hot Water Piping Diagram



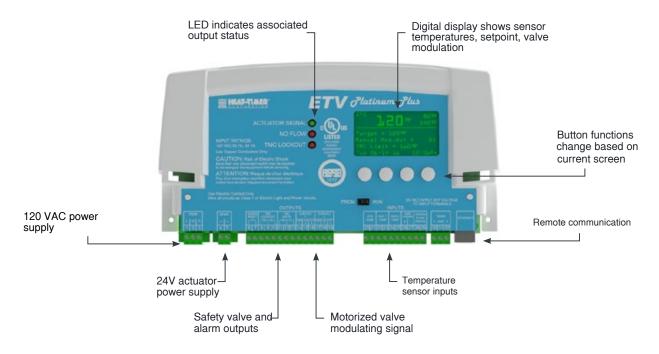
### **Featured Product Specifications**

#### **ETV Platinum Plus Actuator**

# Voltage Input: \_\_\_\_\_\_ 24 VAC 60 Hz Power Consumption: \_\_\_\_\_ 18 VA Control Signal: \_\_\_\_\_ 0-10 V ETV Platinum Valve Body Body & Trim: \_\_\_\_\_ 304 Stainless Maximum Operating Temperature: \_\_\_\_ 300 °F Maximum Working Pressure at 300 °F: \_\_\_ 225 psi Stem Material: 640 Stainless

#### **ETV Platinum PLUS Control**

Voltago Input	100//40 60 H-
Voltage Input:	120VAC 60 HZ
Maximum Input Rating:	48VA
Display:	Graphic Display
Temperature Units:	°F and °C
ETV Set Point Range:	40°F / 4°C to 200°F/ 93°C
Modulation Output Signal:	_ 0-10V, 2-10V, 0-5V, 4-20m A
LED Indicators: 3 (Actuator	Signal, No Flow, Alarm Status
Inputs: Sensors (Hot, Cold, Mixe	ed), Flow Prove, EMS 4-20m A



Every Temperfect uses the Heat-Timer ETV Platinum Plus Controller

#### Questions? We're ready to help.

FlowTherm Systems has a highly trained staff of representatives, designers and engineers who can help you find the best system for your mechanical, plumbing and heat transfer projects. Contact us and we will connect you with the right team member.

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