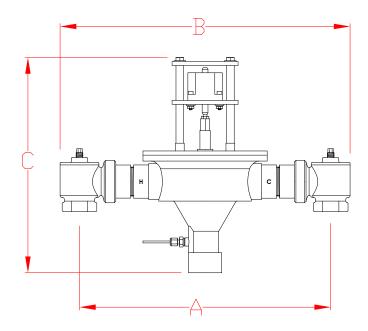
DIGITAL ELECTRONIC EMERGENCY MIXING VALVE



A = 17-1/2" ± 1" **B** = 20 ± 1"
C = 14" ±
$$\frac{1}{2}$$
" **Depth** = 8" ± $\frac{1}{2}$ "

STANDARD CONTROL BOX



NEW "ENHANCED FEATURE SET" CONTROL BOX SEE SELECTABLE OPTIONS PAGE 2





WARNING: This product can expose you to chemicals including lead, which is known to the State of California to cause cancer. For more information, go to www.P65Warnings.Ca.gov

This product is certified to meet Low Lead requirements of wetted surface area containing less than 0.25% lead by weight

ENV-6100-LF

- Digital Electronic Emergency Mixing Valve
- 1-1/4" NPT inlets, 1-1/2" NPT outlet (32mm X 38mm)
- Valve controls at times of no use, 0.0 GPM**
- Maximum operating pressure: 125 PSIG (862 KPA)
- Controls water temperature to +/- 2°F in accordance with ASSE 1071
- Controls water temperature to +/- 2°F during times of low / no system demand
- Self-Balancing, do not need to adjust or balance recirculation
- Self-Cleaning, daily shuttle sweep keeps shuttle free of debris
- Automatic Hot Water shutoff upon cold water inlet supply failure
- Automatic cold water bypass of 40 GPM (in accordance with ASSE 1071) upon hot water inlet supply failure
- Flow switch, tee and 18 inches of 1-1/2" tubing included
- Alerts user when unit requires maintenance
- User programmable set point range between 65°F and 90°F, Displays outlet temperature
- Simple/intuitive user setup
- Reminder to test weekly as per ANSI Z358.1-2014 (ability to turn on / off)
- UL Listed control box and 120V plug in power supply with 6' cord
 - Option for Backup Uninterruptable Power Supply in the event of primary power loss w/ approx. two hours run time

**NOTE: The valve will maintain temperature with 0.0 GPM flow from the emergency loop when properly installed near the hot water source with a continuously operating recirculation pump at minimum flow of 5 GPM.

OPTIONS:

_ **BPS** – Back-up Power Supply, uninterruptable power supply with up to 2 hours run time in case of primary power loss

ASSE 1071 Certified



CSA Certified



Valve electronics are UL Certified





1360 Elmwood Avenue, Cranston, RI 02910 USA Phone: 401.461.1200 Fax: 401.941.5310

Email: info@leonardvalve.com

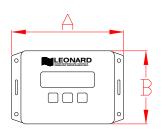
Web Site: http://www.leonardvalve.com

PNV-CONTROLLER OPTIONS

Standard Controller 1.0 Version

Cur term: 120F Set Point: 120F NUCLEUS

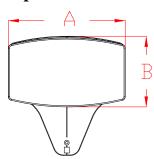
$$A = 6$$
" $B = 4$ " $Depth = 1-3/4$ "



Enhanced Controller 2.0, 2.5, 3.0 Versions



$$A = 8$$
" $B = 4-3/4$ " $Depth = 1-1/4$ "



Leonard Valve Company reserves the right of product, or design modifications without notice or obligation.

STANDARD CONTROLLER:

1.0 – See PAGE 1 for info

ENHANCED CONTROLLER OPTIONS:

UL Listing Pending on 2.0, 2.5 and 3.0 controllers Note: Boxes not field upgradeable

2.0 – Enhanced Proton Controller with Programable Disinfection Mode

Options:

REL – 5 Relay Contacts that Switch during Alarm State

- Helpful for Remote Alerts Within Building to Assist Maintenance and Service Personnel
- 5 Unique States:
 - Loss of Power
 - Broken Temperature Probe
 - "Out of Range" Temperature (±10°F)
 - Motor Connectivity and Operation
 - Maintenance (Service Required) @ <90%Full travel

2.5 – Enhanced Proton Controller including all of 2.0 as well as BACnet MS/TP Connection which provides ability to serve up all data to BMS system

Options:

____3T – Three Additional Temperature Sensors for Monitoring of Inlet Hot, Inlet Cold, and Return Temperatures

REL – 5 Relay Contacts that Switch during Alarm State (as shown above)

____ **3.0** – Enhanced Proton Controller including all of 2.5 as well as all items below as standard,

- WiFi Wifi enabled
- 3T 3 Additional Temperature Sensors for Monitoring of Inlet Hot, Inlet Cold and Return Temperatures
- REL 5 Relay Contacts that Switch during Alarm State

**AVALIBLE $\approx 2^{nd}$ Quarter 2023



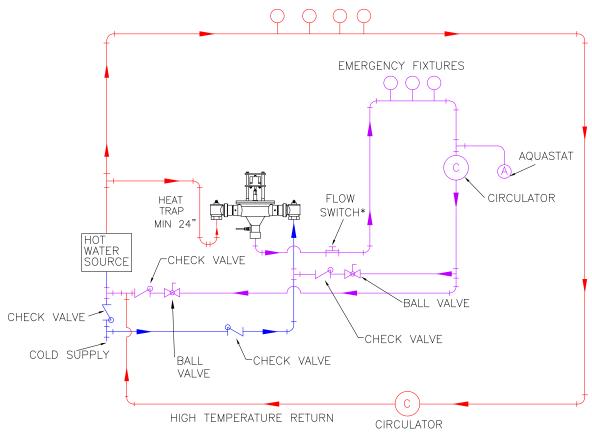
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	PRESSURE DROP										
MINIMUM FLOW	5	10	15	20	25	30	35	40	45	50	PSI
	.3	.7	.97	1.4	1.7	2.1	2.4	2.8	3.1	3.4	BAR
3.0	30	40	47	52	57	60	66	71	76	80	GPM
11.4	114	151	178	197	216	227	250	269	288	303	l/min

HIGH TEMPERATURE FIXTURES (IF APPLICABLE)



* FLOW SWITCH MUST BE LEVEL AND IN CORRECT DIRECTION, FLOW SWITCH SHIPS INSTALLED IN TEE, COPPER TUBING TOTALLING ROUGHLY 18" INCLUDED

CAUTION! All thermostatic water mixing valves have limitations. They will NOT provide the desired accuracy outside of their flow capacity range. Consult the Flow Capacity Chart and DO NOT OVERSIZE. Minimum flow must be no less than as indicated.

NOTE: Flow rates will vary depending on existing field conditions. Leonard Valve Company always recommends using CASPAK® sizing software for proper valve sizing and model number applications.

Engineer's Approval	Job #					
	Arch/Eng.					
	Contractor					

Note: The models shown represent Leonard Products which are believed to be equivalent in type and function to items specified. Leonard Valve Company is not responsible for errors or omissions due to differences in interpretations of information provided.

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