

# REGULATORS BALANCED ZERO 300 °F SERVICE

MODEL: 5111 - BZR-300

Revision: 0

BULLETIN  
5111

## DESCRIPTION

BZR-300 Series Balanced Zero Regulators are used for precise control of heated gases or for equipment locations subjected to high ambient temperatures. They are designed for continuous operation up to 300 °F and to resist corrosion from high sulphur or other corrosive gases. The special high temperature construction does not sacrifice performance.

The BZR-300 series regulators duplicate the precise control characteristics of the standard BZR Regulators. They automatically adjust valve position to hold a desired precise outlet pressure. Slight variations in inlet pressure do not affect the performance.

For installation, see Bulletin 5101 Installation.



## CAPACITY TABLE

Model Number	Pipe Size		SCFH Gas Flow @ 4.0" W.C. Pressure Drop			
	Inlet	Outlet	MFD. 0.4 Sp. Gr.	NAT. 0.6 Sp. Gr.	AIR 1.0 Sp. Gr.	L.P. 1.5 Sp. Gr.
6 - BZR - 300	3/4"	3/4"	790	650	500	410
8 - BZR - 300	1"	1"	1,580	1,290	1,000	820
12 - BZR - 300	1-1/2"	1-1/2"	3,160	2,580	2,000	1,640
16 - BZR - 300	2"	2"	5,530	4,520	3,500	2,860
20 - BZR - 300	2-1/2"	2-1/2"	7,900	6,450	5,000	4,100
24 - BZR - 300	3"	3"	12,600	10,300	8,000	6,500
32 - BZR - 300	4"	4"	22,100	18,100	14,000	11,400

## FEATURES

- Accuracy:
  - Low - Flow:  $\pm 0.1''$  W.C.
  - Full - Flow:  $\pm 0.3''$  W.C.
- Turndown up to 200:1
- Continuous operation to 300 °F
- For use with High Sulphur Gases
- All units factory tested and sealed before shipment
- Maximum inlet pressure: 2.0 psig
- Maximum pressure differential: 14.0" W.C.
- Sensitivity - Responds to signal pressure differential as low as 0.04" W.C.

CAUTION: Operation of combustion equipment can be hazardous resulting in bodily injury or equipment damage. Each burner should be supervised by a combustion safeguard and only qualified personnel should install, make system adjustments and perform any required service.

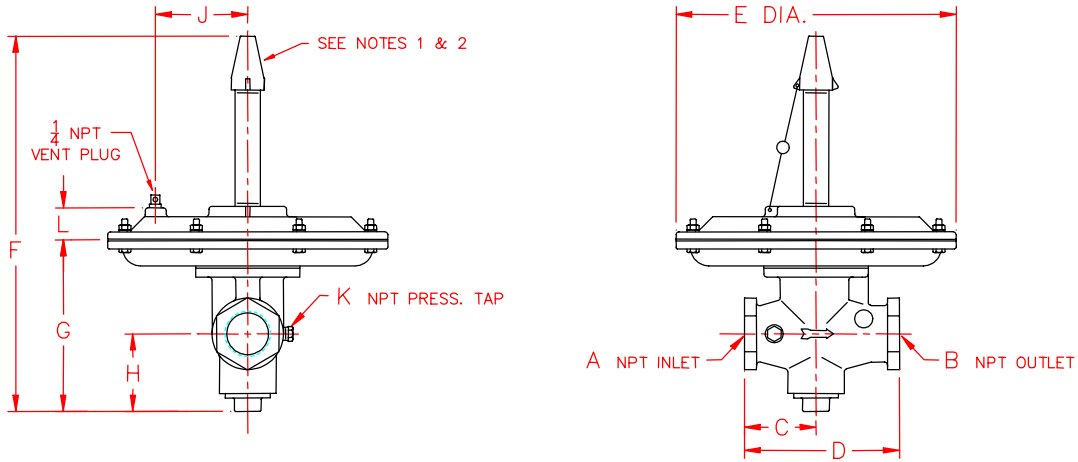


NOTICE: PYRONICS practices a policy of continuous improvement in the design of its products. It reserves the right to change the specifications at any time without prior notice.

# REGULATORS BALANCED ZERO 300 °F SERVICE

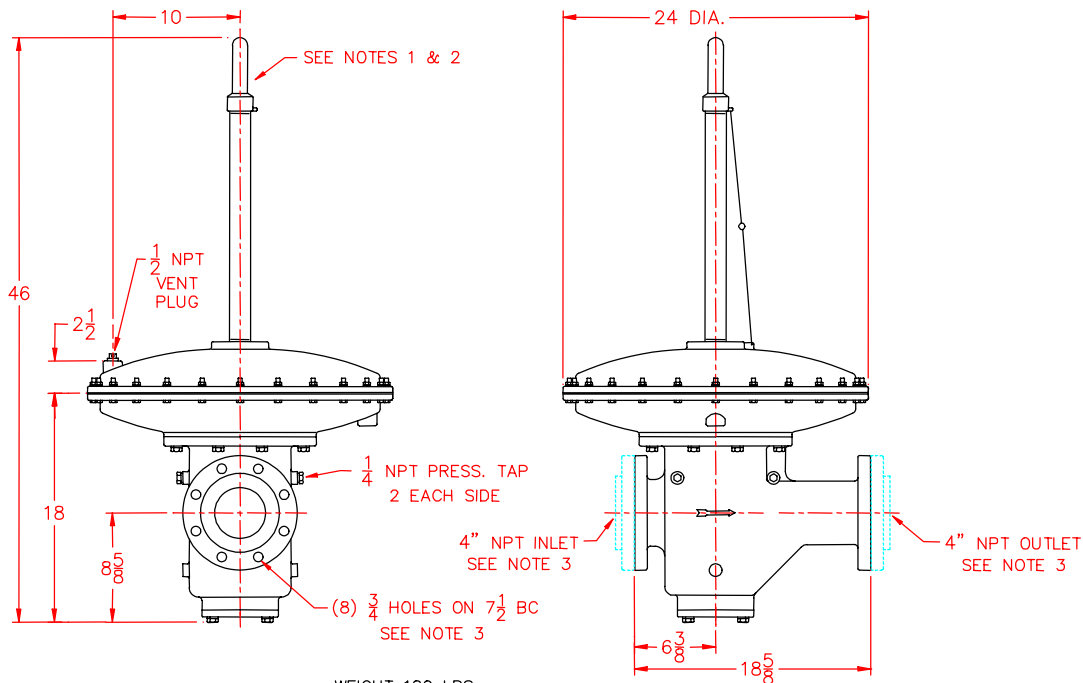
BULLETIN 5111  
PAGE NO.2

## DIMENSIONS: 3/4" - 3" SIZES



Model Number	A	B	C	D	E	F	G	H	J	K	L	Weight Lbs.
6 - BZR - 300	3/4	3/4	2-1/2	5	8-1/4	11-1/4	4-7/8	2	2-3/4	1/8	1-1/4	6.5
8 - BZR - 300	1	1	2-3/8	4-3/4	9-3/4	11-3/4	4-3/4	2	3-3/8	1/8	1-1/4	8.5
12 - BZR - 300	1-1/2	1-1/2	3	6-1/2	11-3/4	15-3/4	7-1/4	3-1/4	3-7/8	1/4	1-3/8	15.5
16 - BZR - 300	2	2	3-1/2	7-1/2	11-3/4	16-1/8	8-1/8	3-7/8	3-7/8	1/4	1-3/8	20.0
20 - BZR - 300	2-1/2	2-1/2	4	8-3/4	14	17-5/8	8-3/4	3-5/8	3-5/8	1/4	1-7/8	50.0
24 - BZR - 300	3	3	5-3/4	11-1/2	14	20-3/8	10-5/8	4-5/8	3-5/8	1/4	1-7/8	60.5

## DIMENSIONS: 4" SIZE



WEIGHT 180 LBS

**NOTES:**

- |  |  |   |
|--|--|---|
| <ol style="list-style-type: none"> <li>1. Spring housing must be perpendicular to pipe run in an upright position.</li> <li>2. Gas pipe run must be horizontal and level.</li> </ol> |  | <ol style="list-style-type: none"> <li>3. Designed to accept standard 4" ANSI flanges.</li> <li>4. All dimensions are in inches.</li> </ol> |
|--|--|---|

## ORDERING INFORMATION

- |  |  |  |
|--|--|--|
| <ol style="list-style-type: none"> <li>1. Specify Inlet and Outlet Pressure.</li> <li>2. Type of Gas, Flow, Specific Gravity and Temperature.</li> </ol> |  | <ol style="list-style-type: none"> <li>3. Specify Model Number and Quantity.</li> <li>4. Shipping Instructions.</li> </ol> |
|--|--|--|