

BIMETALLIC STEAM TRAPS AND AIR VENTS BM89

DESCRIPTION

The BM89 is a series of robust and efficient bimetallic steam traps and air vents. These steam traps are recommended for steam process applications where sensible heat can be recovered, such as steam tracing lines, drip points, storage tank coils and steam air venting. Specially designed for draining high pressure superheated steam lines and processes.

MAIN FEATURES

Modulating discharge.
Discharges condensate below steam saturation temperature.
Excellent air discharge.
Operates with superheated steam.
Unaffected by water hammer and vibrations.
Built-in strainer.

USE: Saturated and superheated steam.

AVAILABLE MODELS: BM89 – carbon steel.

SIZES: 1/2" to 1"; DN 15 to DN 25.

CONNECTIONS: Female threaded ISO 7 Rp or NPT.
Flanged EN 1092-1 PN 160.
Flanged ASME B16.5 Class 900.
Socket weld (SW) ASME B16.11.
Butt weld (BW) ASME B16.25.

INSTALLATION: Horizontal installation is recommended, but can be installed in any position.
See IMI – Installation and maintenance instructions.



CE MARKING – GROUP 2 (PED – European Directive)

PN 160	Category
1/2" to 1" – DN 15 to 25	SEP

BODY LIMITING CONDITIONS

FLANGED PN 160 *	FLANGED CLASS 900 **	RELATED TEMPERATURE
ALLOW. PRES.	ALLOW. PRES.	
160 bar	128,6 bar	300 °C
156,1 bar	120,7 bar	350 °C
140,9 bar	101,4 bar	450 °C
102,8 bar	83,4 bar	500 °C
73,4 bar	64,9 bar	525 °C

PMO – Maximum operating pressure: 110 bar.

TMO – Maximum operating temperature: 525 °C.

* According to EN 1092-1:2018.

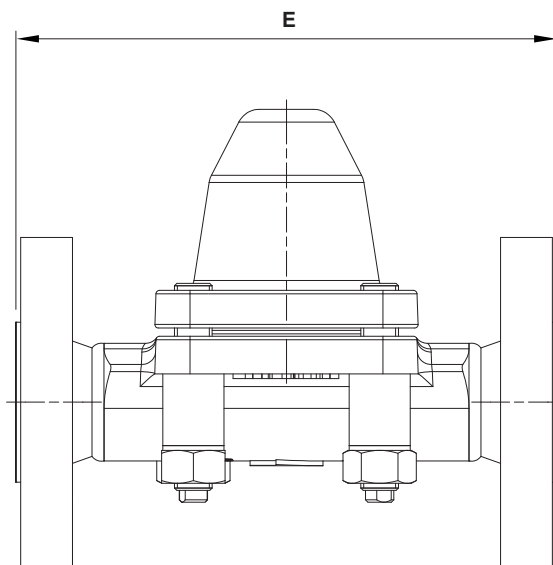
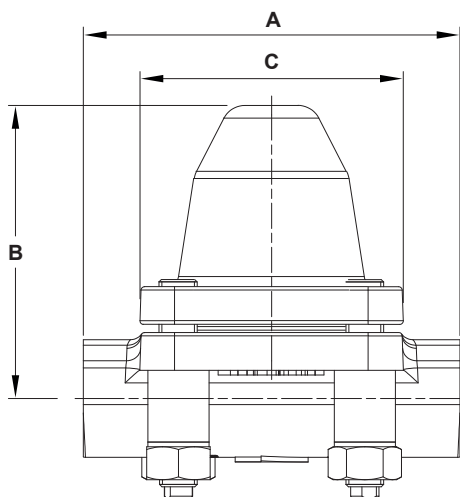
** According to EN 1759-1:2004.

Body limiting conditions PN 160 or below, depending on the type of connection adopted. Rating PN 160 for threaded, SW and BW versions.

FLOW RATE CAPACITY (kg/h)

MODEL	SIZE	DIFFERENTIAL PRESSURE (bar)														
		4	6	8	10	15	20	25	30	40	50	60	70	90	100	110
(A) BM89	1/2" to 1" DN 15 to 25	360	420	490	510	600	650	700	710	790	810	850	900	930	970	990
(B) BM89	1/2" to 1" DN 15 to 25	1500	1750	2000	2200	2700	3000	3300	3600	4000	4500	4900	5300	6000	6200	6500

A: Hot condensate discharge 10 °C below saturation temperature; B: Cold condensate discharge at 20 °C.



DIMENSIONS (mm)

SIZE	THREADED / SW / BW *				PN 160		CLASS 900	
	A	B	C	WEIGHT (kg)	E **	WEIGHT (kg)	E **	WEIGHT (kg)
1/2" – DN 15	160	125	112	6,2	210	7,4	230	8,2
3/4" – DN 20	160	125	112	6,2	–	–	230	8,8
1" – DN 25	160	125	112	6,1	230	9,1	254	10,3

* In case of BW connections please indicate pipe dimensions when ordering. Body limiting conditions may be restricted by the BW end wall thickness. Consult the manufacturer.

** Other face to face dimensions on request.

MATERIALS

POS. N°	DESIGNATION	MATERIAL
1	Body	A182F22 / 1.7380 (Equiv. 10CrMo910)
2	Cover	A182F22 / 1.7380 (Equiv. 10CrMo910)
3	* Gasket	Stainless steel / Graphite
4	* Bimetallic regulator	Corrosion resistant bimetal; Stainless steel
5	* Strainer screen	AISI 304 / 1.4301
6	Stud	A193 Gr. B16
7	Nut	A194 Gr. 4
8	Extension sleeve	A193 Gr. B16

* Available spare parts.

