

## Description

The PR15 is a Cast Iron direct acting below sealed pressure reducing valve. The standard version has an silicon rubber diaphragm and a stainless steel disc and seating.

Note: To protect the actuator diaphragm on steam applications a water seal pot must be installed in the downstream pressure signal line to the actuator.

## Limiting Conditions

Body Design Condition	PN16
Maximum Design Temperature	225 °C
Maximum Cold Hydraulic Test Pressure	30 kgf/cm <sup>2</sup>
Maximum Differential Pressure ( $\Delta p$ )	14 kgf/cm <sup>2</sup>
Minimum Ambient Temperature	0 °C

## Operating Range

Valve Type	Diaphragm Type	Pressure Range (kgf/cm <sup>2</sup> )
PR15 - S4	PR 4di	0.6 – 2.5 *
PR15 - S2	PR 2di	2 – 5 **
PR15 - S1	PR 1di	4.5 – 9 ***

\* DN25 and DN32 Range 0.6 – 1.8 kgf/cm<sup>2</sup>, DN40 and DN50 Range 0.6 – 2.5 kgf/cm<sup>2</sup>, DN65 and DN80 Range 0.8 – 2.8 kgf/cm<sup>2</sup>

\*\* DN25, DN65 and DN80 Range 2.5 – 5.5 kgf/cm<sup>2</sup>, DN32 and DN40 Range 1.5 – 5 kgf/cm<sup>2</sup>, DN50 Range 2 – 5 kgf/cm<sup>2</sup>

\*\*\* DN25 to DN80 Range 4.5 – 9 kgf/cm<sup>2</sup>

## Sizes and Pipe Connections

DN 25, 32, 40, 50, 65, 80 Flanged (DIN 2502)

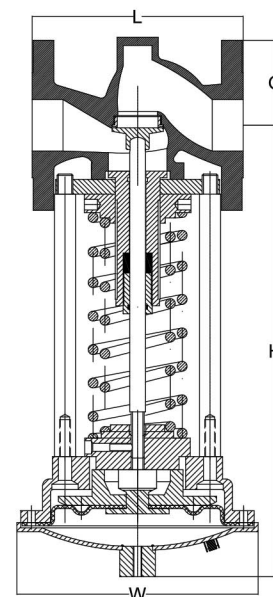
## Dimensions (Approximate) mm

Size	Flanged PN16		Operating Range					
			S1		S2		S4	
	L	G	H	W	H	W	H	W
DN 25	160	60	330	125	315	185	350	265
DN 32	160	70	340	125	315	185	350	265
DN 40	205	75	350	125	315	185	350	265
DN 50	205	80	350	125	315	185	350	265
DN 65	320	90	550	125	550	185	550	265
DN 80	320	100	550	125	550	185	550	265

Constructions are a bit different according the sizes.

## Weights (Approximate) kg

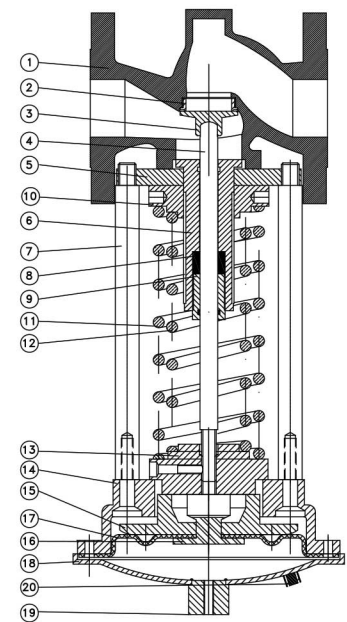
Valve Type	DN 25	DN 32	DN 40	DN 50	DN 65	DN 80
PR15 - S1	12	14	16	18	32	32
PR15 - S2	13.5	14.5	17	18.5	32	32
PR15 - S4	17.5	18.5	20.5	22	35	37



## Pressure Reducing Valves for Steam - PR15

### Materials

No.	Part	Material
1	Body	GG 25
2	Seat	AISI 304
3	Disc	AISI 304
4	Disc Rod	AISI 304
5	Gasket	Clingrit
6	Adjusting Bolt	Brass
7	Scale	C.S.
8	Packing	Graphite or Teflon
9	Glande	Brass
10	Adjusting Nut	Brass
11	Spring Out *	Cadmium Plate
12	Spring In *	Cadmium Plate
13	Spring Seat	Gray Cast
14	Casing	Gray Cast
15	Diaphragm Plate	Gray Cast
16	Diaphragm Support	Aluminum
17	Diaphragm *	Silicon Rubber
18	Upper Casing	C.S.
19	Actuator Stem Screw	C.S.
20	Adjusting Air Vent	Brass



Note: (\*) Spare Part

### Cv Values

Size	DN 25	DN 32	DN 40	DN 50	DN 65	DN 80
Cv	8	12	20	32	50	72

Note: The capacity of E.S.E valves is expressed as the flow co-efficient Cv. The flow co-efficient value Kvs is extensively used in Europe. Its relationship to the Cv unit is given by  $Cv=1.167 Kvs$ .

### Installation

The valve should be mounted vertically downwards in a horizontal pipeline with the direction of flow as indicated by the arrow on the valve body. Full installation and maintenance instructions are supplied with the product.

### How to Order

Example: PR15 – DN25 – S4, direct acting Pressure Reducing Valve.