

## DIAPHRAGM SENSING PRESSURE REDUCING VALVE PRV30SS 1/2" – 3/4"; DN 15 – DN 20

### DESCRIPTION

The ADCA PRV30 series direct acting, spring-loaded diaphragm sensing, balanced plug pressure reducing valves, are designed for use on compressed air, water and other gases or liquids compatible with the construction materials.

They are suitable for pressure reducing stations at the point of use on laundry machines, dyeing, food industries, sterilizers, etc.

### MAIN FEATURES

Compact design.  
Balanced valve.  
Machined from barstock materials or investment casting.

**OPTIONS:** Different soft valves for water and gases.  
Relieving – Internal relief valve to allow reduced outlet pressure in a no-flow condition.  
Built-in strainer.  
Outlet 1/4" gauge connection on body.  
Regulating screw with top cap.

**USE:** Compressed air, water and other gases and liquids compatible with the construction.

**AVAILABLE MODELS:** PRV30SS – Stainless steel.

**SIZES:** 1/2" and 3/4".  
DN 15 and DN 20.

**CONNECTIONS:** Female screwed ISO 7/1 Rp (BS 21) or NPT.  
Flanged EN 1092-1 PN40 / PN63.  
Special flanges upon request.

**INSTALLATION:** Horizontal installation.  
An "Y" strainer should be installed upstream the valve.  
See IMI – Installation and maintenance instructions.

**ORDER REQUIREMENTS:** Type of fluid.  
Maximum operating temperature.  
Inlet pressure and required outlet pressure.  
Capacity (maximum and minimum).



CE MARKING – GROUP 2 (PED – European Directive)	
PN16 / PN63	Category
DN 15 to 20	SEP

CAPACITIES		
Valve size	1/2" – DN 15	3/4" – DN 20
Kvs (m <sup>3</sup> /h)	2,1	2,4

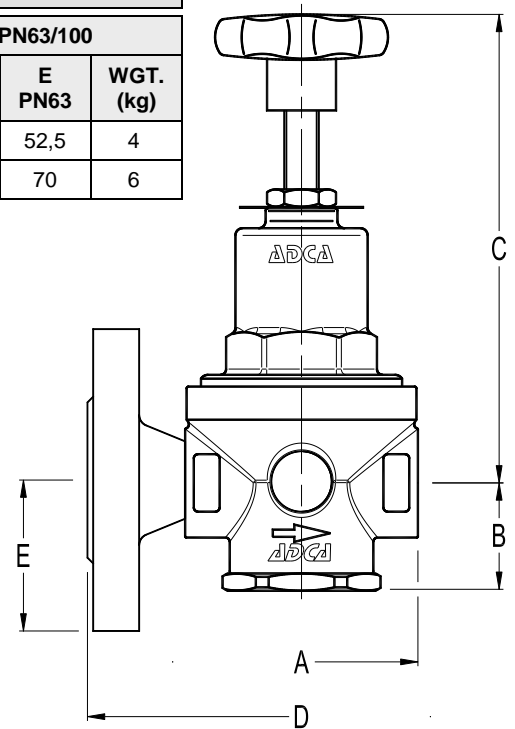
LIMITING CONDITIONS	
Valve model	PRV30SS
Body design conditions	PN63
Max. upstream pressure	50 bar
Max. downstream pressure	15 bar
Min. downstream pressure	0,2 bar
Max. design temperature *	80 °C
Max. recommended reducing ratio	40:1

\* Other on request.

DIMENSIONS (mm)										
Size	Screwed				PN16/40			PN63/100		
	A	B	C	WGT. (kg)	D *	E	WGT. (kg)	D *	E PN63	WGT. (kg)
1/2" – DN 15	80	38	175	1,8	150	47,5	3,2	210	52,5	4
3/4" – DN 20	80	38	175	1,8	150	52,5	3,8	230	70	6

\* Different lengths and connections on request.

Remarks: DN 15 PN16/40 face to face dimensions were adopted as per DN 20. 1" or DN 25 available on special execution and same performance.

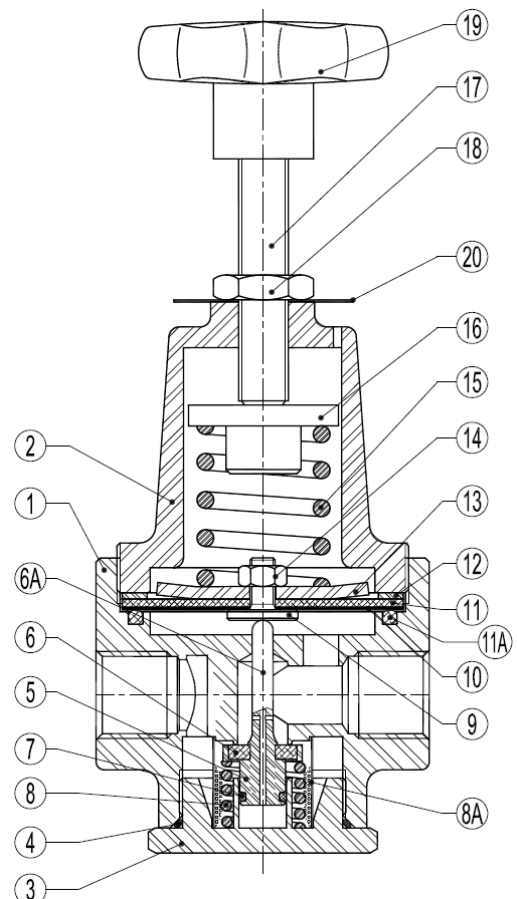


MATERIALS		
POS. Nº	DESIGNATION	MATERIAL
1	Valve body (a)	AISI 316 / 1.4401 (a) CF8M / 1.4408
2	Top cover (a)	AISI 316 / 1.4401 (a) CF8M / 1.4408
3	Seat cover (a)	AISI 316 / 1.4401 (a) CF8M / 1.4408
4	* O-ring	NBR
5	* Piston valve	AISI 316 / 1.4401
6	* Valve head	NBR ; EPDM ; PTFE; etc.
6A	Pushrod	AISI 316 / 1.4401
7	* O-ring	NBR ; EPDM ; PTFE; etc.
8	* Valve spring	AISI 302 / 1.4300
8A	* Strainer screen	AISI 304 / 1.4301
9	Pusher disc	AISI 304 / 1.4301
10	* Diaphragm	PTFE
11	* Diaphragm	NBR **
11A	* O-ring	NBR ; EPDM ; PTFE; etc.
12	Gasket	Aluminium **
13	Spring plate	AISI 304 / 1.4301
14	Nut	Stainless steel A2-70
15	* Adjustment spring	Spring steel
16	Top spring plate	Brass
17	Adjustment screw	AISI 304 / 1.4301
18	Locknut	Stainless steel A2-70
19	Handwheel	Plastic
20	Spring id. plate	Aluminium

\* Available spare parts. \*\* Stainless steel on request.

Remarks: All valves have a serial number. In case of non standard valves this number must be supplied if spare parts are ordered.

a) Bar stock execution on request.



ORDERING CODES PRV30SS												
Valve model	R30	.	1	W	N	C	R		.		15	
PRV30SS – Diaphragm sensing	R30											
<b>Outlet spring range</b>												
N°1 – 0,2 to 1,5 bar			1									
N°2 – 0,3 to 3 bar			2									
N°3 – 0,8 to 8 bar			3									
N°4 – 1,5 to 15 bar			4									
<b>Application</b>												
Water				W								
Gases				G								
Oxygen (degreased)				O								
<b>Seal material</b>												
NBR					N							
EPDM					E							
PTFE					T							
FPM / Viton					V							
<b>Maximum inlet pressure</b>												
30 bar						C						
50 bar a)						D						
<b>Diaphragm material</b>												
Stainless steel (non relieving)							S					
Rubber / PTFE (Relieving or non-relieving)							R					
<b>Gauge port 1/4"</b>												
Without gauge ports								(1)				
Gauge port on the left side (relative to the flow direction)								4				
Gauge port on the right side (relative to the flow direction)								3				
Gauge ports on both sides								2				
<b>Relieving</b>												
Non-relieving									(1)			
Relieving (only for non dangerous gases)									R			
<b>Pipe connection</b>												
Threaded BSP ISO 7/1											A	
Threaded NPT ANSI B1.20.1											C	
Socket weld SW ANSI B16.11											H	
Butt weld BW ANSI B16.25											I	
Flanged EN 1092-1 PN40											N	
Flanged EN 1092-1 PN63											O	
Flanged ANSI B16.5 150 lb											U	
Flanged ANSI B16.5 300 lb											V	
Flanged ANSI B16.5 600 lb											W	
<b>Size</b>												
1/2" or DN 15												15
3/4" or DN 20												20
1" or DN 25 (same performance, with larger connection – special execution)												25E
<b>Special valves / Extras</b>												
Full description or additional codes have to be added in case of non-standard combination.												E

(1) Omitted if a standard valve is requested.

a) The 50 bar inlet is available only with spring n° 4.