

## DIAPHRAGM SENSING PRESSURE REDUCING VALVE PRV30SS 1 1/2" – 2"; DN 40 – DN 50

### 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.

**OPTIONS:** Different soft valves for water and gases.  
Relieving-Internal relief valve to allow reduce 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 1/2" and 2".  
DN 40 and DN 50.

**CONNECTIONS:** Female screwed ISO 7/1 Rp (BS 21) or NPT.  
DN 40-Flanged EN1092-1 Type 11 B PN 40-63.  
DN 50-Flanged EN1092-1 Type 01 A PN 40.\*  
DN 50-Flanged EN1092-1 Type 11 B PN 63.  
\*Type 11 B PN40 welding neck available, with different face to face dimensions.

**INSTALLATION:** Horizontal installation.  
An "Y" strainer should be provided 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).



Type 11 B  
Flanges



Type 01 A  
Flanges

CAPACITIES		
Valve size	40	50
Kvs (m <sup>3</sup> /h)	12,7	13,7

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.

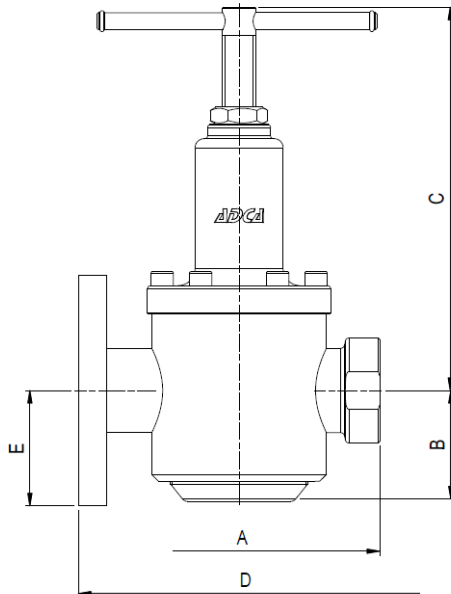
CE MARKING – GROUP 2 (PED – European Directive)	
PN63	Category
DN 40 to 50	1 (CE marked)

**DIMENSIONS (mm)**

Screwed				Flanged PN16/40			Flanged PN63/100				ANSI 150 lb			ANSI 300 lb			
Size	A	B	C	Wgt. (kg)	D *	E	Wgt. (kg)	D *	E PN63	E PN100	Wgt. (kg)	D *	E	Wgt. (kg)	D *	E	Wgt. (kg)
1 1/2" – DN 40	205	86	268	13	201	75	16,3	260	85	85	20,3	235	63,5	15,5	248	78	18
2" – 50	201	80	274	13,3	230 **	82,5	18,5	300	90	97,5	22,8	254	76	18	267	82,5	20

\* Different lengths and ANSI flanges available on request.

\*\* Only available with flat flanges EN 1092-1 type 01 A. Welding neck type 11 B flanges as option with 300mm minimum face to face dimensions.

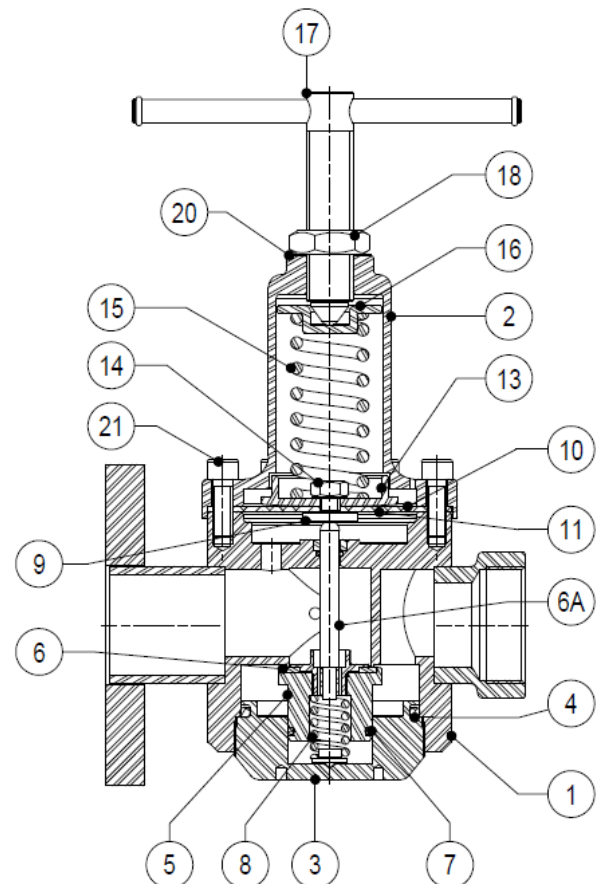


**MATERIALS**

POS. N°	DESIGNATION	MATERIAL
1	Valve body	AISI 316 / 1.4401
2	Top cover	CF8M / 1.4408
3	Seat cover	AISI 316 / 1.4401
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
9	Pusher disc	AISI 304 / 1.4301
10	* Diaphragm	PTFE
11	* Diaphragm	NBR **
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
20	Spring id. plate	Aluminium
21	Bolts	Stainless steel A2-70

\* 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.



ORDERING CODES PRV30SS												
<b>Valve model</b>	R30	.	1	W	N	C	R					40
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 1/2" or DN 40												40
2" or DN 50												50
<b>Special valves / Extras</b>												E

(1) Omitted if a standard valve is requested.

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

b) Full description or additional codes have to be added in case of non-standard combination.