

DIAPHRAGM SENSING PRESSURE REDUCING VALVE PRV 30SS DN 1/2" – 3/4"; DN15 – DN20

DESCRIPTION

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

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 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:

PRV30/SS – Stainless steel.

SIZES:

DN 1/2" and DN 3/4"
DN 15 and DN 20

CONNECTIONS:

Female screwed ISO7/1Rp(BS 21) or NPT.
Flanged EN 1092-1 PN40-PN63.
Special flanges upon request.

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).

| CAPACITIES | | |
|------------|-----|-----|
| Valve Size | 15 | 20 |
| KVs (m3/h) | 2,1 | 2,4 |

| LIMITING CONDITIONS | |
|--------------------------------|---------|
| Valve model | PRV30SS |
| Body design conditions | PN 63 |
| 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.

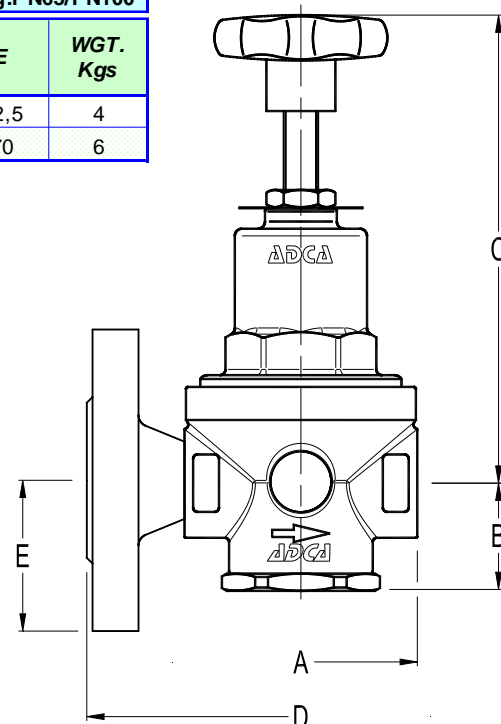
| CE MARKING (PED - European Directive 97/23/EC) | |
|--|--------------------------|
| PN 16-PN63 | Category |
| DN 15 to 20 | SEP - art. 3, paragraph3 |

| DIMENSIONS (mm) | | | | | | | | | | |
|-----------------|----|----|-----|-------------------------|-----|------|--------------------------|-----|------|----------|
| Screwed | | | | EN 1092-1 Flg.PN16/PN40 | | | EN 1092-1 Flg.PN63/PN100 | | | |
| SIZE DN | A | B | C | WGT. Kgs | D* | E | WGT. Kgs | D* | E | WGT. Kgs |
| 1/2"-15 | 80 | 38 | 175 | 1,8 | 150 | 47,5 | 3,2 | 210 | 52,5 | 4 |
| 3/4"-20 | 80 | 38 | 175 | 1,8 | 150 | 52,5 | 3,8 | 230 | 70 | 6 |

* Different lengths and connections on request.

Note: DN15 PN16/40 face to face dim. was adopted as per DN20

DN 1" or DN 25 available on special execution and same performance

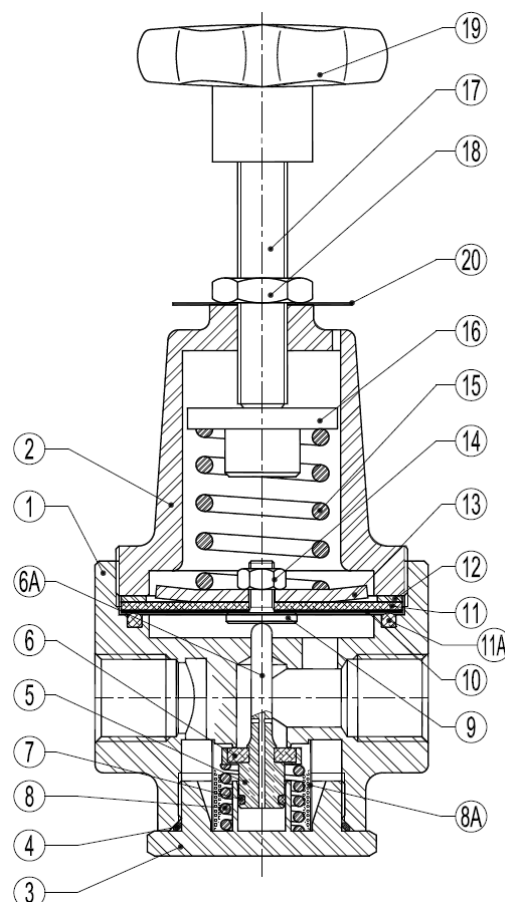


| MATERIALS | | |
|-----------|---------------------|------------------------------------|
| POS. | DESIGNATION | MATERIAL |
| 1 | VALVE BODY (a) | CF8M / 1.4408 (AISI316 / 1.4401) |
| 2 | TOP COVER (a) | CF8M / 1.4408 (AISI316 / 1.4401) |
| 3 | SEAT COVER (a) | CF8M / 1.4408 (AISI316 / 1.4401) |
| 4 | * O-RING | NBR |
| 5 | * PISTON VALVE | AISI316 / 1.4401 |
| 6 | * VALVE HEAD | NBR-EPDM-PTFE, etc |
| 6A | PUSHROD | AISI316 / 1.4401 |
| 7 | * O-RING | NBR-EPDM-PTFE, etc |
| 8 | * VALVE SPRING | AISI302 / 1.4300 |
| 8A | * STRAINER SCREEN | AISI304 / 1.4301 |
| 9 | PUSHER DISC | AISI304 / 1.4301 |
| 10 | * DIAPHRAGM | PTFE |
| 11 | * DIAPHRAGM | ** NBR |
| 11A | * O-RING | NBR-EPDM-PTFE, etc |
| 12 | GASKET | ** ALUMINIUM |
| 13 | SPRING PLATE | AISI304 / 1.4301 |
| 14 | NUT | ST. STEEL A2-70 |
| 15 | * ADJUSTMENT SPRING | SPRING STEEL |
| 16 | TOP SPRING PLATE | BRASS |
| 17 | ADJUSTMENT SCREW | AISI304 / 1.4301 |
| 18 | LOCKNUT | ST. STEEL A2-70 |
| 19 | HANDWHEEL | PLASTIC |
| 20 | SPRING IDENT. 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) Barstock execution on request





| ORDERING CODES PRV30SS | | | | | | | | | | |
|---|-----|---|---|---|---|---|---|-----|-----|-----|
| Valve Model | R30 | . | 1 | W | N | C | R | . | . | 15 |
| PRV30SS - Diaphragm sensing | R30 | | | | | | | | | |
| Outlet spring range | | | | | | | | | | |
| Nº1 - 0,2 to 1,5 bar | | | 1 | | | | | | | |
| Nº2 - 0,3 to 3 bar | | | 2 | | | | | | | |
| Nº3 - 0,8 to 8 bar | | | 3 | | | | | | | |
| Nº4 - 1,5 to 15 bar | | | 4 | | | | | | | |
| Aplication | | | | | | | | | | |
| Water | | | | W | | | | | | |
| Gases | | | | G | | | | | | |
| Oxygen (Degreased) | | | | O | | | | | | |
| Seal material | | | | | | | | | | |
| NBR | | | | | N | | | | | |
| EPDM | | | | | E | | | | | |
| PTFE | | | | | T | | | | | |
| FPM/VITON | | | | | V | | | | | |
| Maximum inlet pressure | | | | | | | | | | |
| 30 bar | | | | | | C | | | | |
| 50 bar a) | | | | | | D | | | | |
| Diaphragm material | | | | | | | | | | |
| Stainless steel (Non-relieving) | | | | | | | S | | | |
| Rubber/PTFE (Relieving or non-relieving) | | | | | | | R | | | |
| Gauge port 1/4" | | | | | | | | | | |
| Without gauge ports | | | | | | | | (1) | | |
| Gauge port on the left side (Related to the flow direction) | | | | | | | | 4 | | |
| Gauge port on the right side (Related to the flow direction) | | | | | | | | 3 | | |
| Gauge ports on both sides | | | | | | | | 2 | | |
| Relieving | | | | | | | | | | |
| Non-relieving | | | | | | | | | (1) | |
| Relieving (Only for non-dangerous gases) | | | | | | | | | R | |
| Pipe connection | | | | | | | | | | |
| Threaded BSP ISO 7/1 Rp | | | | | | | | | | A |
| Threaded NPT ANSI B1.20.1 | | | | | | | | | | C |
| Socket weld SW ANSI B16.11 | | | | | | | | | | H |
| Butt weld BW ANSI B16.25 | | | | | | | | | | I |
| Flanged EN1092-1 PN40 | | | | | | | | | | N |
| Flanged EN1092-1 PN63 | | | | | | | | | | O |
| Flanged ANSI B16.5 150# | | | | | | | | | | U |
| Flanged ANSI B16.5 300# | | | | | | | | | | V |
| Flanged ANSI B16.5 600# | | | | | | | | | | W |
| Size | | | | | | | | | | |
| DN 1/2" or DN 15 | | | | | | | | | | 15 |
| DN 3/4" or DN 20 | | | | | | | | | | 20 |
| DN 1" or DN 25 (same performance but larger connection - special execution) | | | | | | | | | | 25E |
| Special valves / Extras b) | | | | | | | | | | |
| | | | | | | | | | | E |

(1) Omitted if a standard valve is requested

a) The 50 bar inlet available only with spring Nº4

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