







# TWO-WAY ASEPTIC CONTROL VALVES V926A

#### **DESCRIPTION**

The ADCAPure V926A is a series of single seated two-way aseptic control valves with angle connections.

These valves are designed to regulate and accurately control flow of liquids and gases and are suitable for high purity applications found in the pharmaceutical, cosmetic, fine chemical and food & beverage industries.

The V926A can be assembled with pneumatic, hydraulic or electric actuators, for modulating and shut-off control tasks.



Completely manufactured from bar stock material.

Body and bonnet are connected by a clamp coonection, allowing fast and easy maintenance procedures.

High-performance EPDM diaphragm stem sealing.

Cavity-free with no air trap locations.

Metal to metal or soft sealing.

Self-drainable design.

#### STANDARD SURFACE FINISH

Internal wetted parts: ≤ 0,51 micron Ra – SF1.

External :  $\leq 0.76$  micron Ra – SF3.

Other surface conditions see IS PV20.00 E - Technical information.

Ultrasonic cleaning.

OPTIONS: Soft valve sealing.

Reduced bore trims. Heating chamber. Inline connections.

USE: Saturated steam, hot and superheated water.

Process fluids, liquids, air and gases compatible

with the construction.

**AVAILABLE** 

MODELS: V926A.

SIZES: 1/2" to 2".

CONNECTIONS: ASME BPE clamp ferrules or tube weld (ETO)

ends. Others on request.

PACKAGING: Assembling and packaging in a clean room

certified according to ISO 14644-1.

The product is end capped and sealed with recyclable thermo-shrinkable plastic film, to

avoid contamination.

INSTALLATION: Horizontal installation. Vertical inlet and horizontal

outlet. See IMI - Installation and maintenance

instructions.





| LIMITING CONDITIONS *                  |               |  |  |  |  |  |  |  |  |  |
|--|---------------|--|--|--|--|--|--|--|--|--|
| Valve model                            | V926A         |  |  |  |  |  |  |  |  |  |
| Body design conditions                 | PN 16         |  |  |  |  |  |  |  |  |  |
| Maximum operating pressure             | 13 bar @ 38ºC |  |  |  |  |  |  |  |  |  |
| Maximum operating steam pressure       | 6 bar         |  |  |  |  |  |  |  |  |  |
| Max. operating temp. (steam and water) | 170 °C        |  |  |  |  |  |  |  |  |  |
| Maximum operating temperature (air)    | 150 °C        |  |  |  |  |  |  |  |  |  |
| Minimum operating temperature          | - 10 °C       |  |  |  |  |  |  |  |  |  |

<sup>\*</sup> Higher and lower limits on request.

| CE MARKING – GROUP 2<br>(PED – European Directive) |          |  |  |  |  |  |  |  |
|--|----------|--|--|--|--|--|--|--|
| PN 16  | Category |  |  |  |  |  |  |  |
| 1/2" to 2"   | SEP      |  |  |  |  |  |  |  |







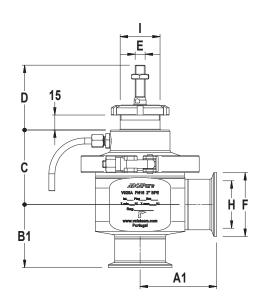
| PLUG DESIGN |                 |                                |                          |                                |                                |  |  |  |  |  |  |
|-------------|-----------------|--------------------------------|--------------------------|--------------------------------|--------------------------------|--|--|--|--|--|--|
|             | PARABO          | DLIC                           | PARABOLIC (SOFT SEALING) |                                |                                |  |  |  |  |  |  |
|             | Sealing:        | Metal to metal                 |                          | Sealing:                       | EPDM                           |  |  |  |  |  |  |
|             | Characteristic: | Equal percentage (EQP), linear |                          | Characteristic:                | Equal percentage (EQP), linear |  |  |  |  |  |  |
| Q           |                 | (PL) or quick-opening (On/Off) |                          | (PL) or quick-opening (On/Off) |                                |  |  |  |  |  |  |
|             | Flow direction: | From below                     |                          | Flow direction:                | From below                     |  |  |  |  |  |  |
|             | Rangeability:   | 50:1 (EQP), 30:1 (PL) or 10:1  |                          | Rangeability:                  | 50:1 (EQP), 30:1 (PL) or 10:1  |  |  |  |  |  |  |
|             |                 | (On/Off)                       |                          |                                | (On/Off)                       |  |  |  |  |  |  |
|             | Leakage:        | Class IV, acc. to IEC 60534-4  |                          | Leakage:                       | Class VI, acc. to IEC 60534-4  |  |  |  |  |  |  |
|             |                 |                                |                          |                                |                                |  |  |  |  |  |  |

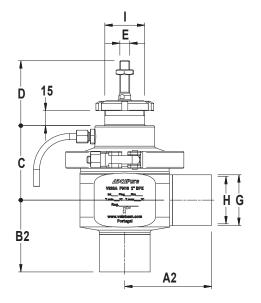
| FLOW RATE COEFFICIENTS – PARABOLIC PL AND EQP PLUGS |            |        |       |   |     |    |      |     |    |     |    |    |    |    |
|---|------------|--------|-------|---|-----|----|------|-----|----|-----|----|----|----|----|
| 0.75  | Kvs (m³/h) |        |       |   |     |    |      |     |    |     |    |    |    |    |
| SIZE  | 0,1 *      | 0,25 * | 0,5 * | 1 | 1,5 | 2  | 2,3  | 2,9 | 4  | 6,3 | 10 | 16 | 25 | 40 |
| 1/2"  | •          | •      | •     | • | •   | •  |      |     |    |     |    |    |    |    |
| 3/4"  |            |        |       |   |     |    | •    | •   | •  |     |    |    |    |    |
| 1"  |            |        |       |   |     |    | •    | •   | •  | •   |    |    |    |    |
| 11/2"   |            |        |       |   |     |    |      |     | •  | •   | •  | •  |    |    |
| 2"  |            |        |       |   |     |    |      |     |    |     | •  | •  | •  | •  |
| SEAT Ø (mm)   | 4 8        |        |       | 1 | 2   | 15 | 19.2 | 25  | 32 | 38  | 47 |    |    |    |
| STROKE (mm)   |            | 7,5    |       |   |     |    |      |     |    |     |    |    |    |    |

<sup>\*</sup> Microflow only available with linear characteristic.

For conversion Kvs = Cv (US) x 0,865.

## **DIMENSIONS**



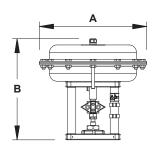






| DIMENSIONS (mm) |      |      |           |           |      |  |  |  |  |  |  |
|-----------------|------|------|-----------|-----------|------|--|--|--|--|--|--|
| DIMENSION       | SIZE |      |           |           |      |  |  |  |  |  |  |
| DIMENSION       | 1/2" | 3/4" | 1"        | 11/2"     | 2"   |  |  |  |  |  |  |
| A1              | 61   | 61   | 61        | 77        | 77   |  |  |  |  |  |  |
| A2              | 66   | 66   | 66        | 85        | 87   |  |  |  |  |  |  |
| B1              | 41   | 46   | 49        | 62        | 63   |  |  |  |  |  |  |
| B2              | 41   | 46   | 49        | 70        | 72   |  |  |  |  |  |  |
| С               | 54   | 56   | 58        | 68        | 75   |  |  |  |  |  |  |
| D               |      |      | 65        |           |      |  |  |  |  |  |  |
| E               |      |      | M10 x 1,5 |           |      |  |  |  |  |  |  |
| F               | 25   | 25   | 50,5      | 50,5      | 64   |  |  |  |  |  |  |
| G               | 12,7 | 19,1 | 25,4      | 38,1      | 50,8 |  |  |  |  |  |  |
| Н               | 9,4  | 15,8 | 22,1      | 34,8 47,5 |      |  |  |  |  |  |  |
| I               |      |      | M40 x 1,5 |           |      |  |  |  |  |  |  |
| WEIGHT (kg)     | 2    | 2,1  | 2,3       | 3,8       | 4,3  |  |  |  |  |  |  |

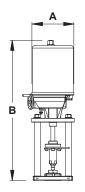
Remarks: Face to face dimensions are not standardized. Different dimensions available on request.



## PA SERIES PNEUMATIC ACTUATORS

| DIMENSIONS (mm) |      |       |       |  |  |  |  |  |  |  |  |
|-----------------|------|-------|-------|--|--|--|--|--|--|--|--|
| DIMENSION       | PA10 | PA206 | PA281 |  |  |  |  |  |  |  |  |
| Α               | 170  | 209   | 275   |  |  |  |  |  |  |  |  |
| В               | 251  | 236   | 243   |  |  |  |  |  |  |  |  |
| WEIGHT (kg)     | 6,3  | 6,2   | 9,6   |  |  |  |  |  |  |  |  |

<sup>\*</sup> For actuators with spring ranges 1 - 2 bar; 1,5 - 3 bar and 2 - 4 bar. For more information, please consult IS 3.05 – PA Linear pneumatic actuators.



#### **EL SERIES ELECTRIC ACTUATORS**

| DIMENSIONS (mm) |             |     |  |  |  |  |  |  |  |  |
|-----------------|-------------|-----|--|--|--|--|--|--|--|--|
| DIMENSION       | EL20 - EL45 |     |  |  |  |  |  |  |  |  |
| Α               | 129         | 148 |  |  |  |  |  |  |  |  |
| В               | 333         | 485 |  |  |  |  |  |  |  |  |
| WEIGHT (kg)     | 2,1         | 8   |  |  |  |  |  |  |  |  |

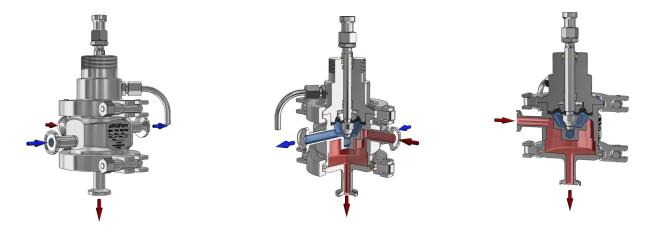
For more information, please consult IS 3.72 – EL Linear electric actuators.





|      | MATERIALS             |                        |  |  |  |  |  |  |  |  |  |  |
|------|-----------------------|------------------------|--|--|--|--|--|--|--|--|--|--|
| POS. | DESIGNATION           | MATERIAL               |  |  |  |  |  |  |  |  |  |  |
| 1    | Valve body            | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 2    | Bonnet                | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 3    | * Valve plug          | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 4    | * Plug disc           | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 5    | * Stem                | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 6    | * Valve plug seal     | ** EPDM                |  |  |  |  |  |  |  |  |  |  |
| 7    | * O-ring              | *** EPDM               |  |  |  |  |  |  |  |  |  |  |
| 8    | Lower diaphragm plate | *** AISI 316L / 1.4404 |  |  |  |  |  |  |  |  |  |  |
| 9    | Upper diaphragm plate | AISI 316L / 1.4404     |  |  |  |  |  |  |  |  |  |  |
| 10   | * Diaphragm           | EPDM                   |  |  |  |  |  |  |  |  |  |  |
| 11   | * Guide bushing       | PTFE                   |  |  |  |  |  |  |  |  |  |  |
| 12   | * O-ring              | EPDM                   |  |  |  |  |  |  |  |  |  |  |
| 13   | * Scraper ring        | FPM; NBR               |  |  |  |  |  |  |  |  |  |  |
| 14   | Clamp                 | AISI 316 / 1.4401      |  |  |  |  |  |  |  |  |  |  |
| 15   | Compression fitting   | AISI 304 / 1.4301      |  |  |  |  |  |  |  |  |  |  |
| 16   | Discharge pipe        | AISI 316 / 1.4401      |  |  |  |  |  |  |  |  |  |  |
| 17   | Lock nut              | CF8 / 1.4308           |  |  |  |  |  |  |  |  |  |  |
| 18   | Lock nut              | AISI 304 / 1.4301      |  |  |  |  |  |  |  |  |  |  |

<sup>\*</sup> Available spare parts; \*\* Others on request. \*\*\* Sizes 11/2" and 2" only.
Remarks: FDA / USP Class VI seals certificate on request.
All valves have a serial number. In case of non-standard valves, this number must be supplied if spare parts are ordered.



Optional heating chamber (to maintain the required temperature of the fluid flowing through the valve)





| ORDERING CODES   | S V926A a                 | 1) |   |   |   |   |   |    |   |    |     |  |
|--|---------------------------|----|---|---|---|---|---|----|---|----|-----|--|
| Valve model  | V9A                       | 1  | S | U | Е | М | Е | FD | Х | XD | 015 |  |
| V926A - AISI 316L / 1.4404 aseptic control valve, two-way, angle body          | V9A                       |    |   |   |   |   |   |    |   |    |     |  |
| Valve series   |                           |    |   |   |   |   |   |    |   |    |     |  |
| Series 1   |                           | 1  |   |   |   |   |   |    |   |    |     |  |
| Bonnet design  |                           |    | 1 |   |   |   |   |    |   |    |     |  |
| Standard   |                           |    | S |   |   |   |   |    |   |    |     |  |
| With heating chamber H   |                           |    |   |   |   |   |   |    |   |    |     |  |
| Flow direction   |                           |    |   |   |   |   |   |    |   |    |     |  |
| Flow under the plug  |                           |    |   | U |   |   |   |    |   |    |     |  |
| Stem and body sealing  |                           |    |   |   |   |   |   |    |   |    |     |  |
| EPDM E   |                           |    |   |   |   |   |   |    |   |    |     |  |
| Valve sealing  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Metal to metal (class IV)  | Metal to metal (class IV) |    |   |   |   |   |   |    |   |    |     |  |
| Soft sealed with EPDM (class VI)   |                           |    |   |   |   | Е |   |    |   |    |     |  |
| Characteristic   |                           |    |   |   |   |   |   |    |   |    |     |  |
| Equal percentage (EQP)   |                           |    |   |   |   |   | Е |    |   |    |     |  |
| Linear (PL)  |                           |    |   |   |   |   | L |    |   |    |     |  |
| Quick-opening (On/Off)   |                           |    |   |   |   |   | Q |    |   |    |     |  |
| Flow rate coefficient  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Kvs 4  |                           |    |   |   |   |   |   | FD |   |    |     |  |
| See table below for other Kvs value codes                                      |                           |    |   |   |   |   |   |    |   |    |     |  |
| Surface finish b)  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Standard surface finish  |                           |    |   |   |   |   |   |    | X |    |     |  |
| Mirror mechanical polished external surfaces (SF1)                             |                           |    |   |   |   |   |   |    | Р |    |     |  |
| Electropolished internal wetted parts (SF5)                                    |                           |    |   |   |   |   |   |    |   |    |     |  |
| Pipe connection  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Clamp ferrule ASME BPE   |                           |    |   |   |   |   |   |    |   | DX |     |  |
| Tube weld (ETO) according to ASME BPE  |                           |    |   |   |   |   |   |    |   | DI |     |  |
| Size   |                           |    |   |   |   |   |   |    |   |    |     |  |
| 1/2"   |                           |    |   |   |   |   |   |    |   |    | 015 |  |
| 3/4"   |                           |    |   |   |   |   |   |    |   |    | 020 |  |
|  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Special valves / Ex  |                           |    |   |   |   |   |   |    |   |    |     |  |
| Full description or additional codes have to be added in case of a non-standar |                           |    |   |   |   |   |   |    |   |    |     |  |

- a) Codification for valve only. For actuator codes, refer to the appropriate information sheet.
- $\mbox{\bf b)}$  Consult IS PV20.00 for further details and other surface finish options.

|      | FLOW RATE COEFFICIENT CODES |      |     |    |     |    |     |     |    |     |    |    |    |    |
|------|-----------------------------|------|-----|----|-----|----|-----|-----|----|-----|----|----|----|----|
| Kvs  | 0,1                         | 0,25 | 0,5 | 1  | 1,5 | 2  | 2,3 | 2,9 | 4  | 6,3 | 10 | 16 | 25 | 40 |
| Code | M4                          | M2   | M1  | R4 | R3  | R2 | R1  | R0  | FD | FE  | FF | FG | FH | FI |