

∨KD **DN 65÷100**

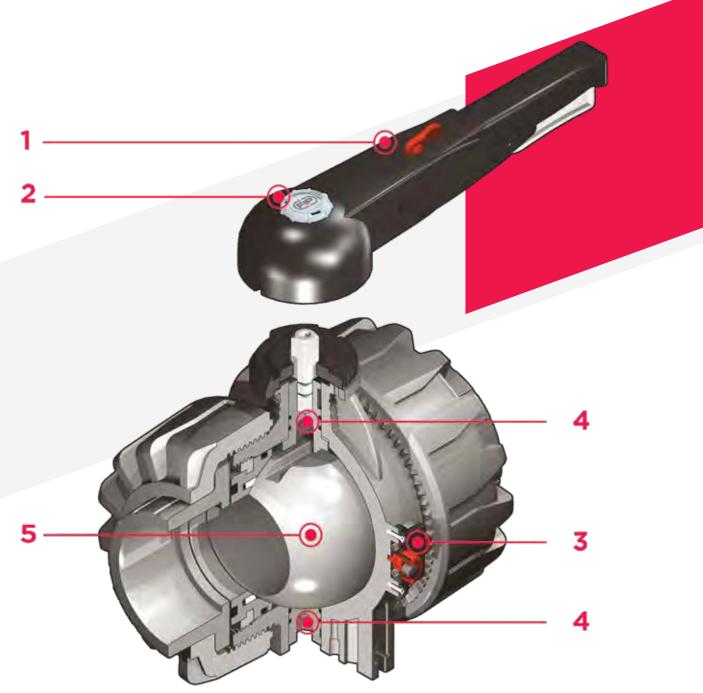
FIP has developed a VKD DUAL BLOCK® ball valve to introduce a high reference standard in thermoplastic valve design. VKD is a True Union ball valve that meets the most stringent needs required by industrial applications. This valve is also equipped with a customising Labelling System.



DUAL BLOCK® 2-WAY BALL VALVE

- Connection system for solvent weld, threaded and flanged joints
- Patented SEAT STOP* ball carrier system that lets you micro-adjust seals and minimise axial force effects
- Easy radial disassembly allowing quick replacement of O-rings and ball seats without any need for tools
- PN16 True Union valve body made for rigid PVC-C injection moulding equipped with built-in bores for actuation. ISO 9393 compliant test requisites
- Option of disassembling downstream pipes with the valve in the closed position
- Full bore ball with high surface finish
- Carrier integrated in the body for valve anchoring]
- Possibility of installing a manual reducer or pneumatic and/or electric actuators by applying an ISO standard drilling pattern PP-GR flange
- STAINLESS steel co-moulded stem, with square section as per ISO 5211
- Valve material compatibility (PVC-C) and elastomer seal elements (EPDM or FKM), with water, drinking water and other food substances as per current regulations
- Possibility to have handle with integrated LSQT limit micro switch, even as a retrofit in existing installations

Technical specifications								
Construction	2-way True Union ball valve with locked carrier and union nuts.							
Size range	DN 65 ÷ 100							
Nominal pressure	PN 16 with water at 20° C							
Temperature range	0 °C ÷ 100 °C							
Coupling standards	Solvent welding: EN ISO 15493, ASTM F 439. Can be coupled to pipes according to EN ISO 15493, ASTM F 441							
	Thread: ISO 228-1, DIN 2999, ASTM F 437.							
	Flanging system: ISO 7005-1, EN ISO 15493 EN 558-1, DIN 2501, ANSI B.16.5 cl.150, JIS B 2220.							
Reference standards	Construction criteria: EN ISO 16135, EN ISO 15493							
	Test methods and requirements: ISO 9393							
	Installation criteria: DVS 2204, DVS 2221, UNI 11242							
	Actuator couplings: ISO 5211							
Valve material	PVC-C							
Seal material	EPDM, FKM; PTFE (ball seats)							
Control options	Manual control; electric actuator; pneumatic actuator							

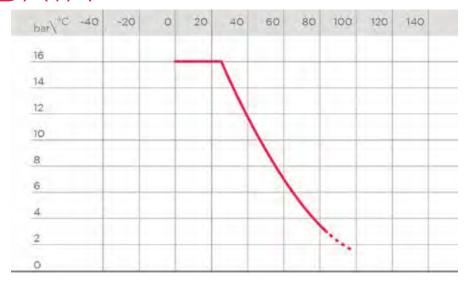


- 1 HIPVC ergonomic multifunctional handle for quick operation, lock and graduated adjustment in 10 positions. Possibility of inhibiting rotation with a lock
- 2 Customisable Labelling System: LCE module made of a transparent protection plug
- and **customisable tag holder** using the LSE set (available as accessory). The customisation lets you identify the valve on the system according to specific needs
- **DUAL BLOCK*** patented lock system that ensures union nut tightening hold even in severe
- conditions such as vibrations or heat dilation
- **4 Double stem** with double O-Rings for ball centring and operating torque reduction
- Machined high surface finish ball that guarantees a smooth operation and increased reliability.

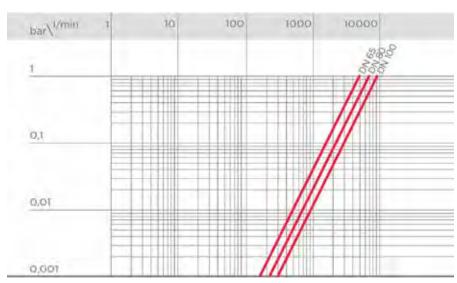
TECHNICAL DATA

PRESSURE VARIATION ACCORDING TO TEMPERATURE

For water and harmless fluids to which the material is classified as CHEMICALLY RESISTANT. In other cases, a reduction of the nominal PN pressure is required (25 years with safety factor).



PRESSURE DROP GRAPH

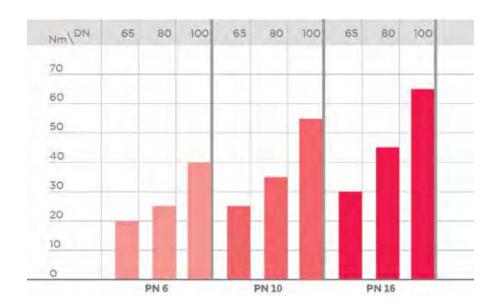


K_v100 FLOW COEFFICIENT

The $\rm K_100$ flow coefficient is the Q flow rate of litres per minute of water at a temperature of 20°C that will generate Δp = 1 bar pressure drop at a certain valve position. The Kv100 values shown in the table are calculated with the valve completely open.

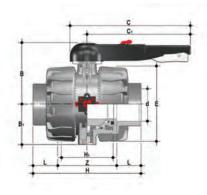
100	80	65	DN
9500	7100	5250	K_100 I/min

OPERATING TORQUE AT MAXIMUM WORKING PRESSURE



The information in this leaflet is provided in good faith. No liability will be accepted concerning technical data that is not directly covered by recognised international standards. FIP reserves the right to carry out any modification. Products must be installed and maintained by qualified personnel.

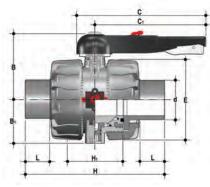
DIMENSIONS



VKDIC

DUAL BLOCK® 2-way ball valve with female ends for solvent welding, metric series

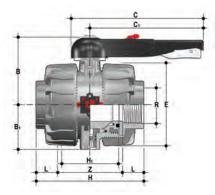
d	DN	PN	В	B ₁	С	C ₁	Е	Н	H ₁	L	Z	g	EPDM code	FKM code
75	65	16	164	87	225	175	164	235	133	44	147	4750	VKDIC075E	VKDIC075F
90	80	16	177	105	327	272	203	270	149	51	168	7838	VKDIC090E	VKDIC090F
110	100	16	195	129	385	330	238	308	167	61	186	12137	VKDIC110E	VKDIC110F



VKDDC

DUAL BLOCK® 2-way ball valve with male ends for solvent welding, metric series

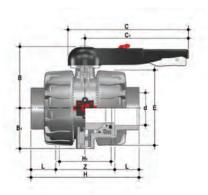
d	DN	PN	В	B ₁	С	C,	Е	Н	H ₁	L	g	EPDM code	FKM code
75	65	16	164	87	225	175	164	235	133	44	4789	VKDDC075E	VKDDC075F
90	80	16	177	105	327	272	203	270	149	51	7691	VKDDC090E	VKDDC090F
110	100	16	195	129	385	330	238	308	167	61	11931	VKDDC110E	VKDDC110F



VKDFC

DUAL BLOCK® 2-way ball valve with BSP threaded female ends

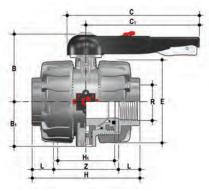
R	DN	PN	В	B ₁	С	C ₁	Е	Н	H ₁	L	Z	g	EPDM code	FKM code
2" 1/2	65	16	164	87	225	175	164	235	133	33,2	168,6	4769	VKDFC212E	VKDFC212F
3"	80	16	177	105	327	272	203	270	149	35,5	199	7910	VKDFC300E	VKDFC300F
4"	100	16	195	129	385	330	238	308	167	37,6	232,8	12262	VKDFC400E	VKDFC400F



VKDAC

DUAL BLOCK® 2-way ball valve with female ends for solvent welding, ASTM series

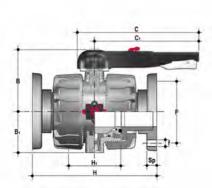
d	DN	PN	В	B ₁	С	C,	Е	Н	H,	L	Z	g	EPDM code	FKM code
2"1/2	60	16	164	87	225	175	164	235	133	44,5	146	4762	VKDAC212E	VKDAC212F
3"	80	16	177	105	327	272	203	270	149	48	174	7850	VKDAC300E	VKDAC300F
4"	100	16	195	129	385	330	238	308	167	57,5	193	12222	VKDAC400E	VKDAC400F



VKDNC

DUAL BLOCK® 2-way ball valve with NPT threaded female ends

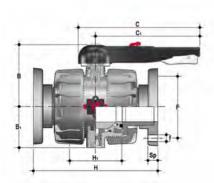
R	DN	PN	В	B ₁	С	C ₁	Е	Н	H ₁	L	Z	g	EPDM code	FKM code
2" 1/2	65	16	164	87	225	175	164	235	133	33,2	168,6	4769	VKDNC212E	VKDNC212F
3"	80	16	177	105	327	272	203	270	149	35,5	199	7910	VKDNC300E	VKDNC300F
4"	100	16	195	129	385	330	238	308	167	37,6	232,8	12262	VKDNC400E	VKDNC400F



VKDOC

DUAL BLOCK* 2-way ball valve with fixed flanges, drilled EN/ISO/DIN PN10/16. Face to face according to EN 558-1

d	DN	PN	В	B ₁	С	C ₁	F	f	Н	H ₁	Sp	U	g	EPDM code	FKM code
75	65	16	164	87	327	175	145	17	290	133	21	4	6413	VKDOC075E	VKDOC075F
90	80	16	177	105	327	272	160	17	310	149	21,5	8	9669	VKDOC090E	VKDOC090F
110	100	16	195	129	385	330	180	17	350	167	21,5	8	14967	VKDOC110E	VKDOC110F



VKDOACDUAL BLOCK® 2-way ball valve with fixed flanges, drilled ANSI B16.5 cl.150 #FF. Face to face according to EN 558-1

Size	DN	PN	В	B ₁	С	C ₁	F	f	Н	H,	Sp	U	g	EPDM code	FKM code
2" 1/2	65	16	164	87	327	175	139,7	18	290	133	21	4	6413	VKDOC075E	VKDOC075F
3"	80	16	177	105	327	272	152,4	18	310	149	21,5	8	9669	VKDOC090E	VKDOC090F
4"	100	16	195	129	385	330	190,5	18	350	167	21,5	8	14697	VKDOC110E	VKDOC110F