3-WAY THREADED BALL VALVE

KV-L53
KV-L54

3-way L-port / T-port · 1000 WOG · full port

High performance 3-way full port threaded end ball valve, NPS ¼ – 1½ (DN8 – 40). KV-L53 L-port and KV-L54 T-port, both direct mount standard type.

- Built-in ISO 5211 direct mounting pad
- Anti-static devices · blow-out proof stem
- Positive location & locking every 90°
- TA-Luft design approved
- Casting approved by TÜV AD 2000-Merkblatt W0
- NACE MR-0175 (optional)



1000 WOG	¼–1½ NPS	F03–F07	L / T
PRESSURE CLASS	DN8 – DN40	ISO 5211 PAD	3-WAY PORT

Two port patterns.

DIRECT MOUNT STANDARD TYPE

KV-L53 · 3-way L
L-port ball · flow plans J (90° turn) and K (180° turn)

KV-L54 · 3-way T
T-port ball · flow plans A–D (90° turn) and E–H (180° turn)

Applicable standards

Design	MSS SP-110
Wall thickness	EN 12516-3
Pipe thread	ASME B1.20.1, BS 21, DIN 2999/259, ISO 228/1, JIS B0203, ISO 7/1
Inspection & testing	MSS SP-110

Options

1	Actuator
2	Limit switch
3	Positioner
Ends	Threaded NPT, DIN, PT, BSP etc.

MATERIALS

CF8M (1.4408) · CF8 (1.4308) · WCB (1.0619) · TFM1600 / PTFE seats · FKM O-ring

Torque values.

CLOSE TO OPEN · STANDARD SEATS TFM1600 & PTFE

ΔP		75 psig 5 bar		150 psig 10 bar		300 psig 20 bar		700 psig 50 bar		1000 psig 63 bar	
NPS	DN	N·m	in·lb	N·m	in·lb	N·m	in·lb	N·m	in·lb	N·m	in·lb
1/4	8	9	80	9	80	9	80	9	80	9	80
3/8	10	9	80	9	80	9	80	9	80	9	80
1/2	15	9	80	9	80	10	88	10	88	10	88
3/4	20	14	124	14	124	15	133	15	133	15	133
1	25	18	159	18	159	19	168	22	195	25	221
1-1/4	32	25	221	26	230	27	239	33	292	36	319
1-1/2	40	35	310	38	336	42	372	46	407	50	442

Torque figures at 5 bar are maximum values tested after valves are placed for 24 hours. For actuator sizing, a safety factor of minimum 30% is recommended.

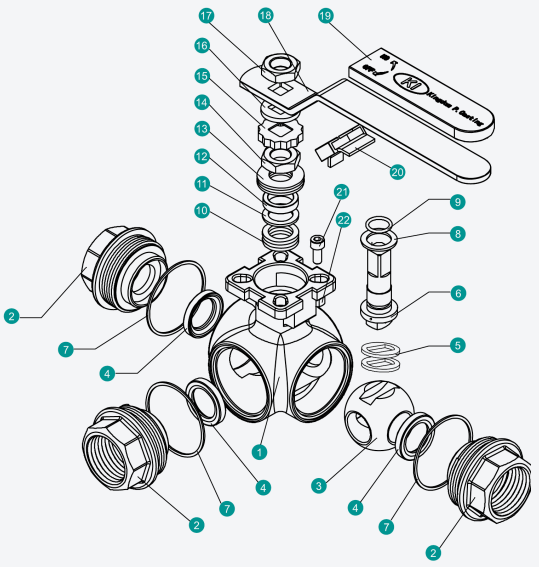
Material of construction.

BY BODY GRADE

No.	Part	CF8M	CF8	WCB
1	**Body**	CF8M (1.4408)	CF8 (1.4308)	WCB (1.0619)
2	**End cap (thread)**	CF8M (1.4408)	CF8 (1.4308)	WCB (1.0619)
3	**Ball**	CF8M	CF8	
4	**Ball seat**	TFM1600 / PTFE		
5	**Washer**	316	304	
6	**Stem (anti-static)**	316	304	
7	**Body gasket**	PTFE / graphite*		
8	**Thrust washer**	PTFE / TFM1600		
9	**O-ring**	FKM		
10	**Packing**	PTFE / graphite*		
11	**Bushing**	50% SS + 50% PTFE / 304*		
12	**Gland**	316		
13	**Belleville washer**	301		
14	**Stem nut**	A194-8		
15	**Stop-lock-cap**	304		
16	**Handle gland**	304		
17	**Handle nut**	A194-8		
18	**Handle**	304		
19	**Handle sleeve**	Vinyl plastic		
20	**Lock device**	304		
21	**Stop bolt**	A2-70		
22	**Stop nut**	A2-70		

* Alternative materials (graphite, 304) are marked in the source without a further note – please confirm with us when specifying.

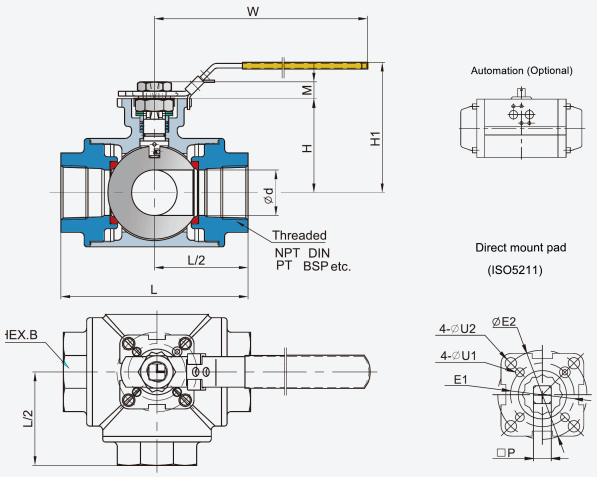
EXPLODED VIEW



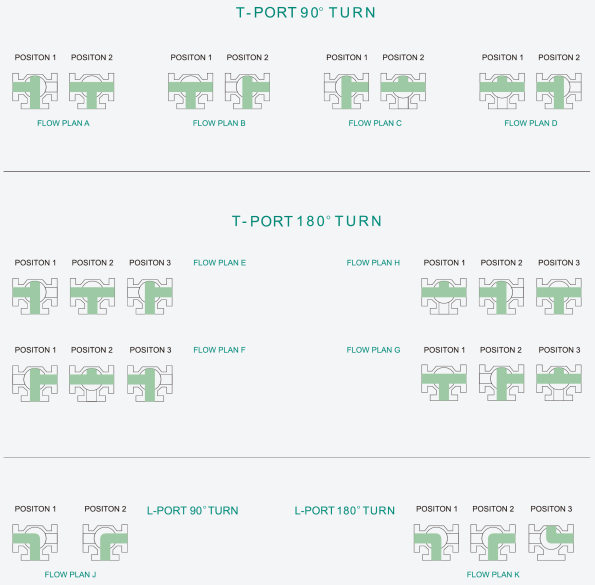
Pressure-temperature data

Kingdom publishes P-T curves for ASTM A351 Gr. CF8M and A216 Gr. WCB bodies with PTFE and TFM1600 seats (NPS ¼–1 and NPS 1¼–1½) – available on request.

GENERAL ARRANGEMENT · DIRECT MOUNT PAD



FLOW PATTERNS FOR 3-WAY VALVE



ANSI 1000 WOG dimensions.

MM

NPS	DN	d	L	H	H1	W	P	M	E1	E2	U1	U2	HEX.B	ISO 5211
1/4	8	11	79	43.0	73	147	9	9	36	42	6	6	22	F03~F04
3/8	10	11	79	43.0	73	147	9	9	36	42	6	6	23.5	F03~F04
1/2	15	15	88	49.0	79	147	9	9	36	50	6	7	27	F03~F05
3/4	20	20	108	59.5	91	177	11	11	42	50	6	7	34	F04~F05
1	25	25	124	63.0	93	177	11	11	42	70	6	9	41	F04~F07
1-1/4	32	32	135	73.5	105	215	14	14	50	70	7	9	50	F05~F07
1-1/2	40	40	164	82.8	115	215	14	14	50	70	7	9	56	F05~F07

Inch version of the dimension table is published by Kingdom – available on request. Threaded ends NPT, DIN, PT, BSP etc.

Data supplied by Kingdom Flow Control and provided for reference only. Specifications may change without notice – please confirm details with Actuation Valve & Control before ordering.

Need a 3-way ball valve ready to automate?

Talk to our UK team about L-port and T-port valves and actuated packages.

actuation.co.uk