

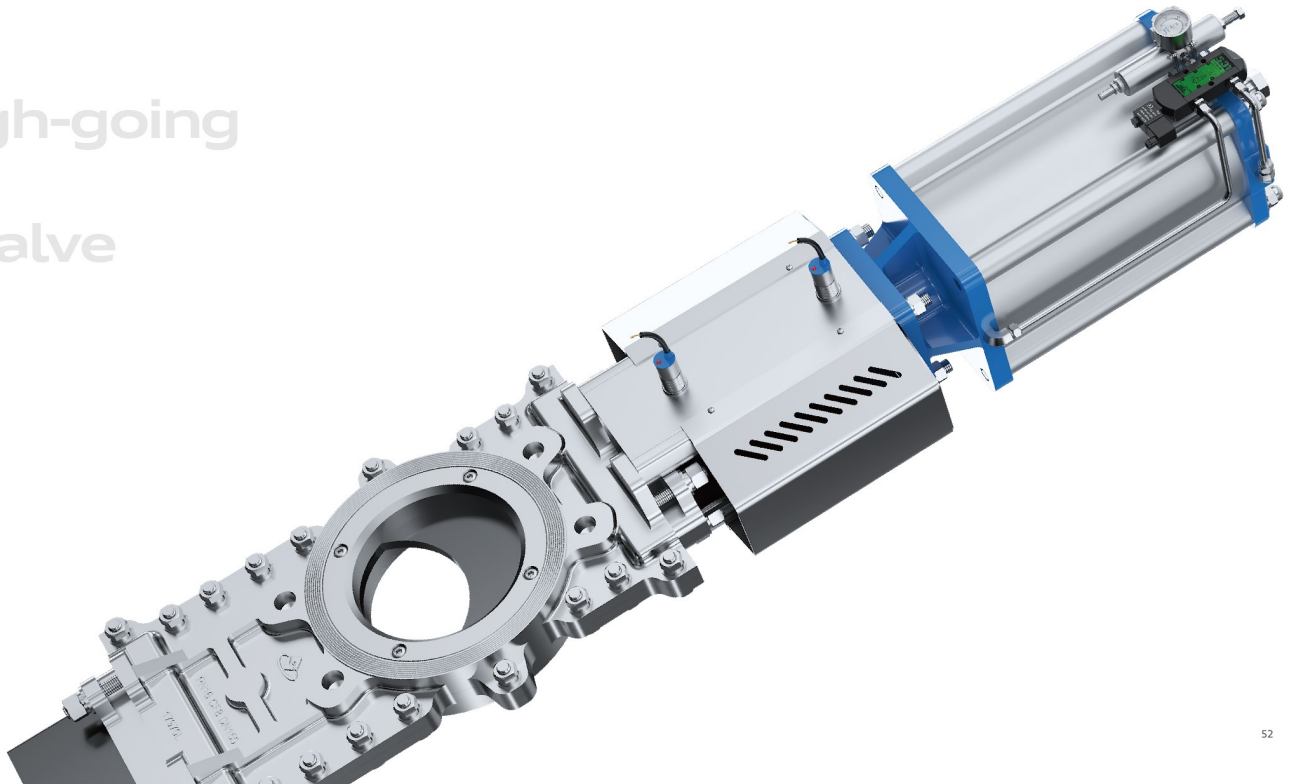


KV CONTROLS

Control & Isolation Valves



Through-going Knife Gate Valve



52

KNIFE GATE VALVE

Application

Linuo DT series knife gate valve is mainly intended for process control in pulp slurry, residue discharge and sewage treatment.

It is especially suitable for installation with equipment such as stock cleaners, gravity separators, aquapulper.

Features

1. Valve is full port in the open position with low flow resistance.
2. Two-piece body construction with no cavities eliminates product build-up.
3. Tight shutoff, reliable performance.
4. O-ring loaded removable seat is self-compensating with good abrasion resistance and long service life.
5. Available with metal seat, PTFE seat, or EPDM seat - selection is based on application.

Technical Specification

Nominal Diameter: DN80~DN600

Nominal Pressure: PN10, PN16, ANSI150

Working Temperature: -29°C~100°C, -29°C~230°C

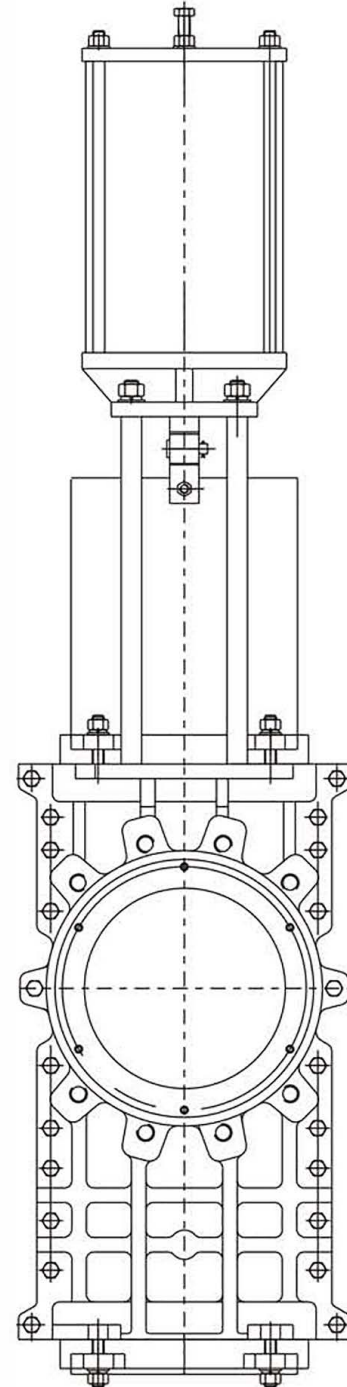
Air Supply Pressure: 5~7 bar

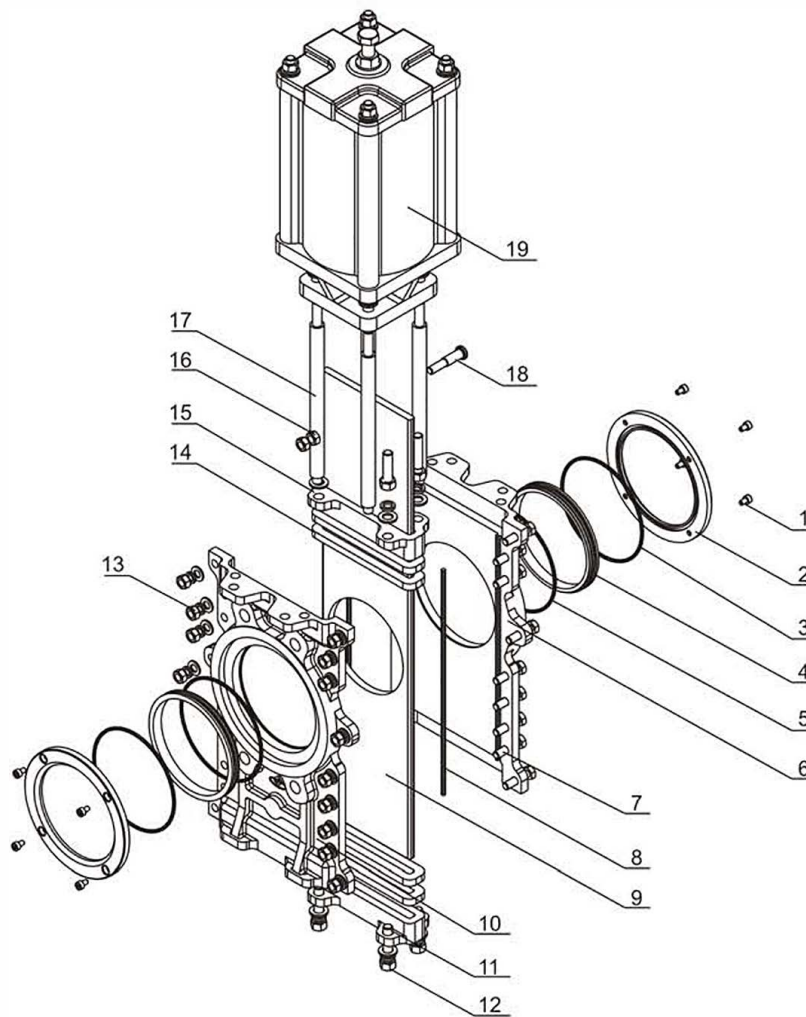
Connection Type: Wafer

Bi-Directional: Soft seated valves are bi-directional to 10 bar in the preferred direction with limited tightness at low pressure in non-preferred.

Parts and Material

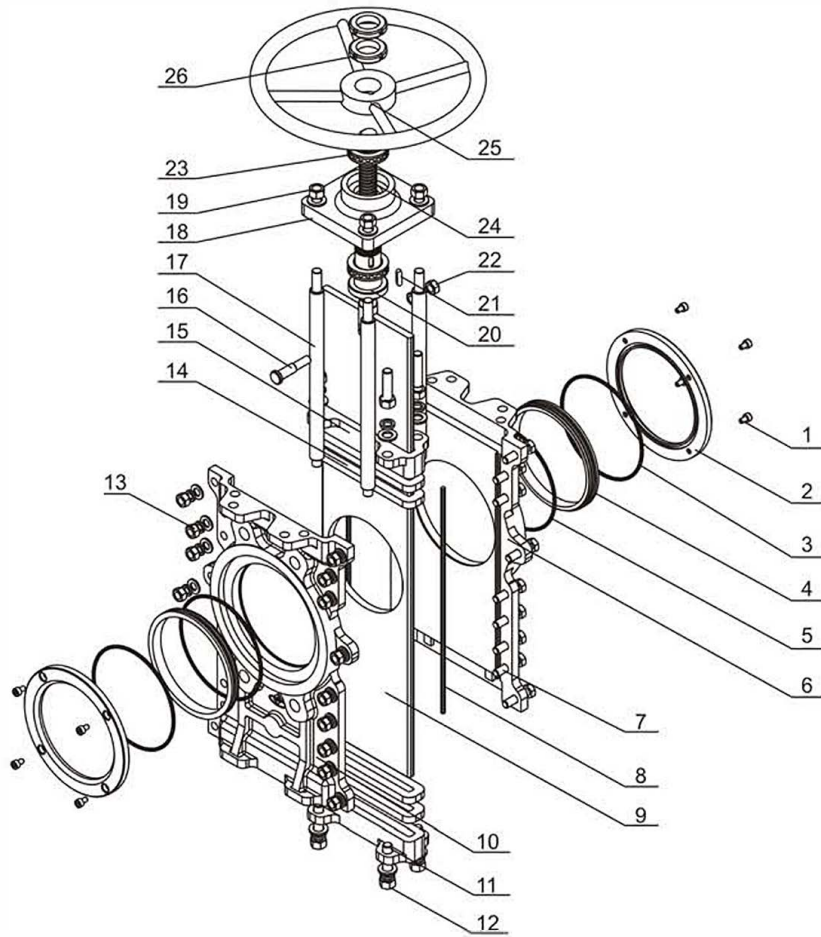
Body	WCB	C F8	CF8M
Gate	410+Cr	304+Cr	316+Cr
Seat	304+Cr/STL	304+Cr/STL	316+Cr/STL
Piston Rod	45#+Cr	45#+Cr	45#+Cr
Packing	PTFE/Graphite		
Media	Sewage, Pulp, Syrup, Slag etc.		





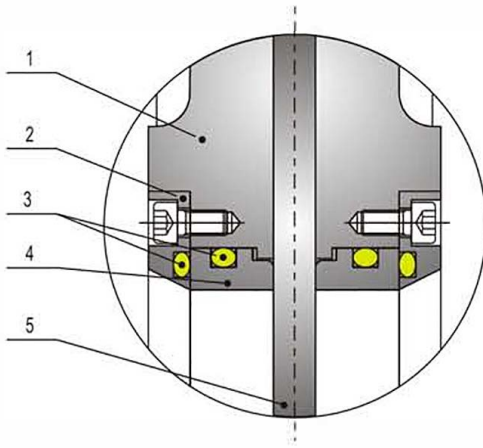
PARTS LIST-Model DT

No.	Description	QTY	Material
1	Hexagon Socket Head Cap Screws	Varies	304
2	Sealing Cap	2	304/316
3	O-ring	2	NBR/Viton
4	Seat	2	304/316+Cr
5	O-ring	2	NBR/Viton
6	Upper Body	1	CF8/CF8M/WCB
7	Hexagon Bolt	Varies	304
8	Sealing Rope	2	NBR
9	Gate	1	304/316/410+Cr/N
10	Lower Body	1	CF8/CF8M/WCB
11	Stud	Varies	304
12	Hexagon Nut	Varies	304
13	Hexagon Nut	Varies	304
14	Packing	1	PTFE
15	Gland Packing	2	CF8/CF8M/WCB
16	Hexagon Nut	2	304
17	Connection Rod	4	304/45+Cr
18	Connection Pin	1	304
19	Actuator	1	/



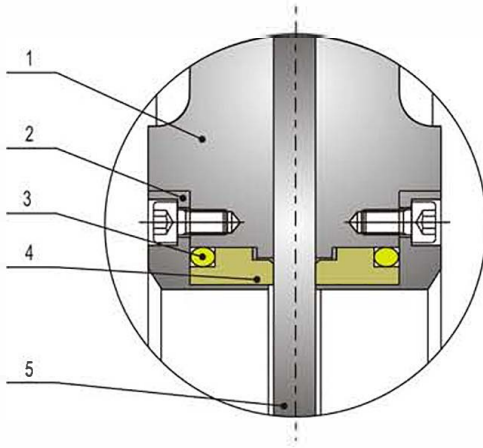
PARTS LIST-Model DT

No.	Description	QTY	Material	No.	Description	QTY	Material
1	Hexagon Socket Head Cap Screws	Varies	304	14	Packing	1	PTFE
2	Sealing Cap	2	304/316	15	Gland Packing	2	CF8/CF8M/WCB
3	O-ring	2	NBR/Viton	16	Connection Pin	1	304
4	Seat	2	304/316+Cr	17	Pillar	4	304/45+Cr
5	O-ring	2	NBR/Viton	18	Square Plate	1	Z1108
6	Upper Body	1	CF8/CF8M/WCB	19	Hexagon Nut	4	304
7	Hexagon Bolt	Varies	304	20	Driving Nut	1	ZCuZn38Mn2Fb2
8	Sealing Rope	2	NBR	21	Flat Key	1	45
9	Gate	1	304/316/410+Cr/N	22	Hexagon Nut	2	304
10	Lower Body	1	CF8/CF8M/WCB	23	Plane Bearing	2	GCr6
11	Stud	Varies	304	24	Connection Rod	1	304
12	Hexagon Nut	Varies	304	25	Hand Wheel	1	Ductile Iron
13	Hexagon Nut	Varies	304	26	Nut	1	45



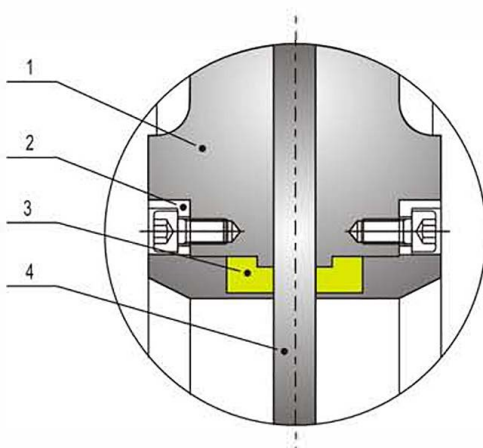
Metal Seat

No	Name	Temp Range °C
1	Body	
2	Retainer	-29°C-100°C
3	O-ring	-29°C-230°C
4	Seat	
5	Gate	



PTFE Sealing Seat

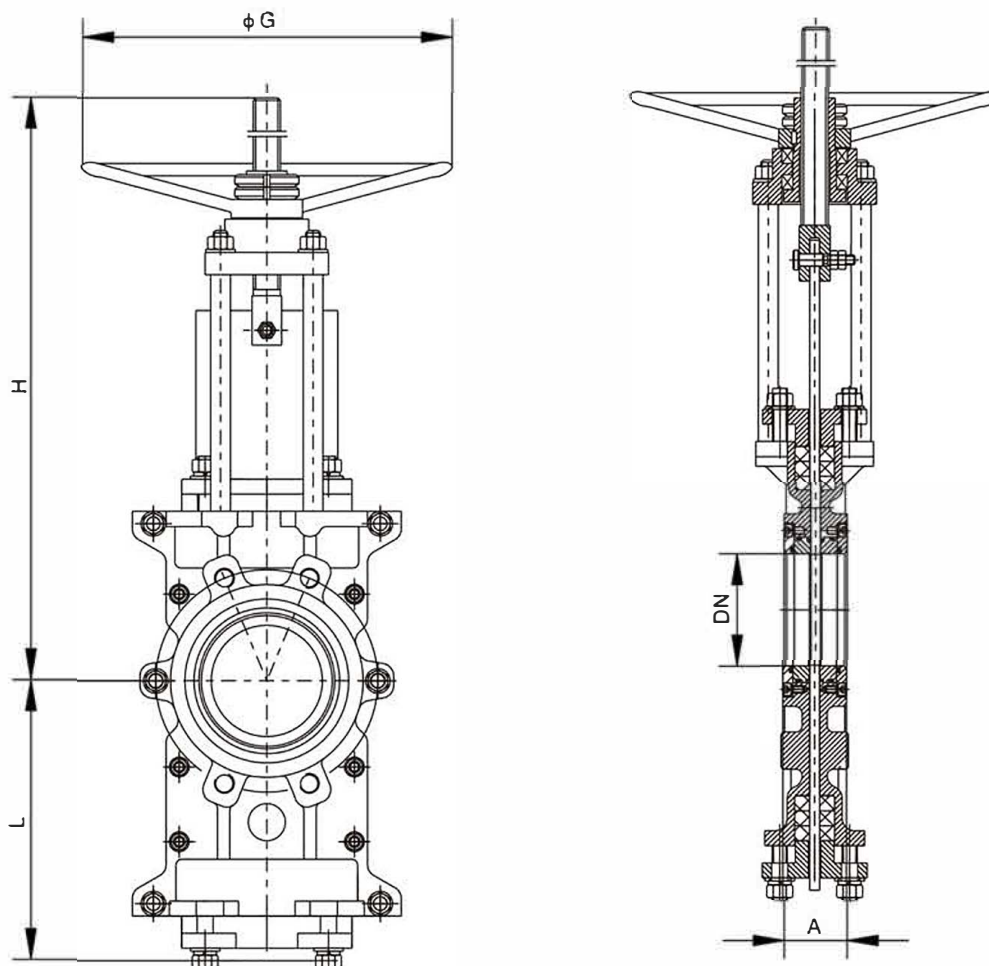
No	Name	Temp Range °C
1	Body	
2	Retainer	
3	O-ring	-29°C-100°C
4	PTFE Seat	
5	Gate	



EPDM Sealing Seat

No	Name	Temp Range °C
1	Body	
2	Retainer	-20°C-100°C
3	EPDM Seat	
4	Gate	

For service temperature exceeds the above range, please consult Linuo factory for solution.



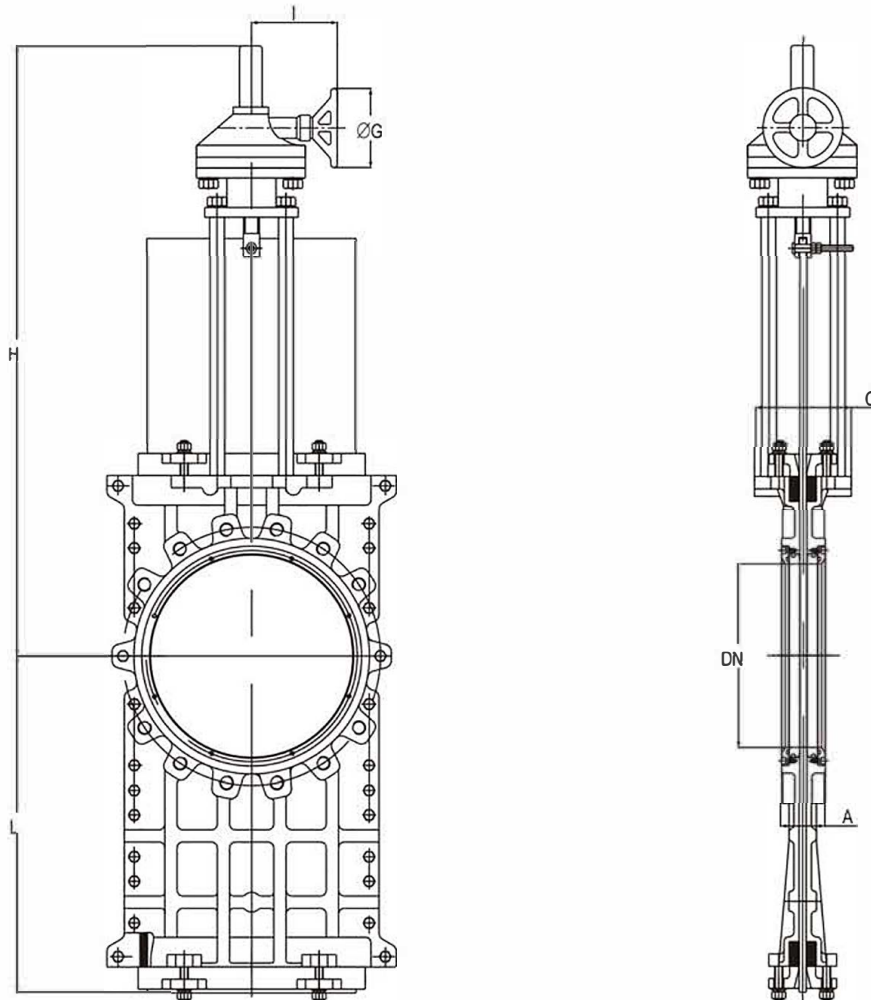
Dimensions-Model DT Series with Hand Wheel Dimensions in mm

DN (mm)	A	B	C	φ G	H (Fully Open/Fully Close)	L
80	51	200	100	220	400/480	250
100	51	220	100	220	430/530	350
125	57	250	100	250	490/615	410
150	57	270	120	280	530/695	450
200	70	350	130	315	620/820	570
250	70	410	140	355	740/990	630
300	76	470	160	400	840/1140	710
350	76	550	200	450	950/1300	810
400	89	620	210	500	1030/1430	910

Through-going Knife Gate Valve

Size	Torque(N · m)
DN80	91
DN100	110.5
DN125	149.5
DN150	182
DN200	214.5
DN250	312
DN300	403
DN350	598
DN400	676
DN450	845
DN500	0
DN600	1105

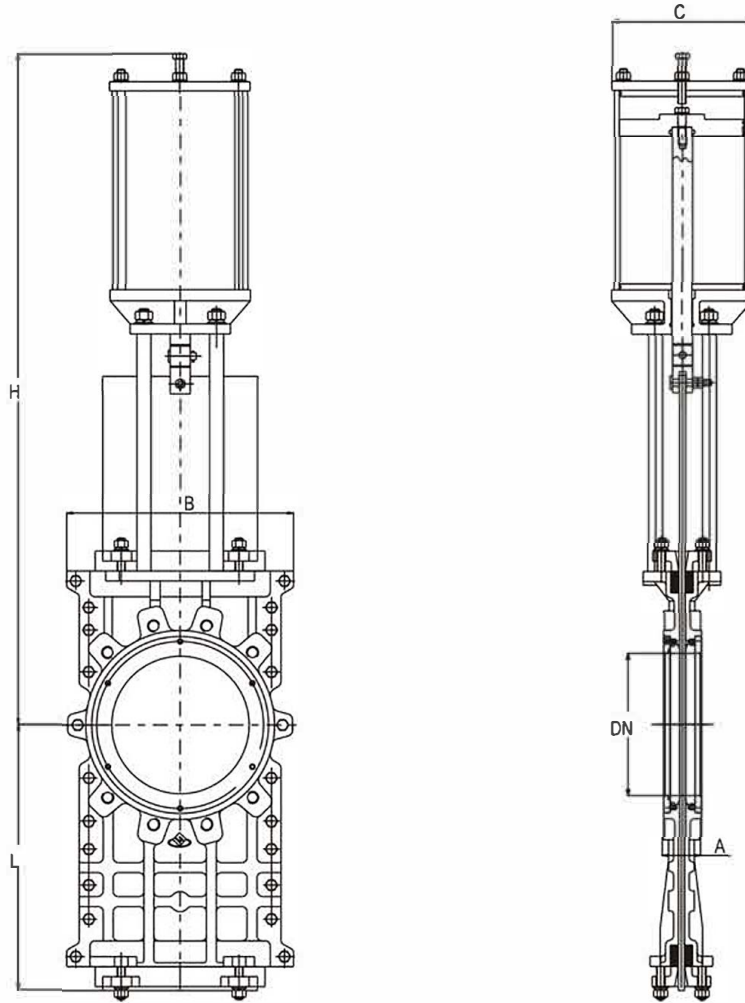
With 30% safety factor included



Dimensions-Model DT Series with Bevel Gear

Dimensions in mm

DN (mm)	A	B	C	φ G	H (Fully Open/Fully Close)	I	L
200	70	350	130	310	750/850	225	570
250	70	410	140	310	860/1110	225	630
300	76	470	160	310	990/1290	225	710
350	76	550	200	310	1100/1450	260	810
400	89	620	210	310	1170/1570	260	910
450	110	700	220	460	1360/1810	340	1000
500	114	730	220	460	1410/1910	340	1110
600	134	860	250	460	1630/2190	340	1280

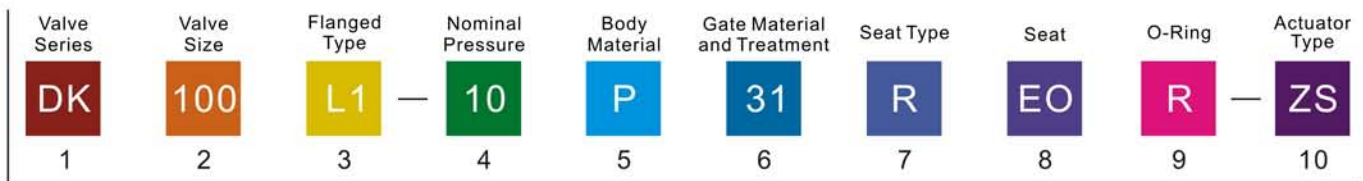


Dimensions-Model DT Series with Pneumatic Actuator

Dimensions in mm

DN (mm)	A	B	C	L (Fully Open/Fully Close)	H
80	51	200	120	250	610
100	51	220	145	350	620
125	57	250	180	410	755
150	57	270	180	450	800
200	70	350	240	520	1000
250	70	410	240	630	1170
300	76	470	290	710	1350
350	76	550	350	810	1570
400	89	620	400	910	1700
450	110	700	450	1000	1940
500	114	730	450	1100	2050
600	134	860	500	1280	2350

How To Order - Knife Gate Valves



1 Valve Series

DK Slurry Knife Gate Valve	DT Through-going Knife Gate Valve
DF Square Knife Gate Valve	DB Funnel Knife Gate Valve
DS Double Knife Gate Valve	DQ Wafer Type Knife Gate Valve
DC Lugged Type Knife Gate Valve	

Knife Gate Valve

2 Valve Size

050 DN50 2"	250 DN250 10"	600 DN600 24"
080 DN80 3"	300 DN300 12"	700 DN700 28"
100 DN100 4"	350 DN350 14"	800 DN800 32"
125 DN125 5"	400 DN400 16"	900 DN900 36"
150 DN150 6"	450 DN450 18"	1000 DN1000 40"
200 DN 200 8"	500 DN 500 20"	

3 Flanged Type

L1 RF Lugged	D1 RF Wafer
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4 Nominal Pressure

10	PN10	01	150Lb
16	PN16	1K	10K

5 Body Material

C	WCB	B	LCB
P	CF8	D	LCC
Q	CF3	W	WC6
M	CF8M	L	CF3M

6 Gate Material and Treatment

3 SS304	7 SS317	1 Hard Chrome Plating
4 SS304L	8 SS410	3 Nickel Base Alloy
5 SS316	9 SS201	4 Tungsten Carbide
6 SS316L		5 Ionitriding
		6 Stellite

7 Seat Type

Y Metal Seat	R Soft Seat
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8 Seat

Metal Seat		Soft Seat	
3 SS304	1 Hard Chrome Plating	PO	PTFE
4 SS304L	2 Nickel Plating	RO	RTFE
5 SS316	3 Nickel Base Alloy	NO	NYLON
6 SS316L	4 Tungsten Carbide	LO	PPL
7 SS317	5 Ionitriding	KO	PEEK
8 SS410	6 Stellite	EO	EPDM
9 SS201			

9 O-Ring

R	NBR	Temp.Range	-20°C~100°C
E	EPDM	Temp.Range	-20°C~120°C
V	VITON	Temp.Range	-20°C~230°C

10 Actuator Type

ZS	Double Acting
ZK	Electric Motor
SD	Manual

Note: Not all materials available for all models.

Note: Dimensions are for reference only. Consult factory for certified drawings.

Note: Specifications subject to change.

Wide industrial application range served by KV CONTROL product including
Chemical / Petrochemical / Oil & Gas / Pulp & Paper / Biochemistry / Pharmaceutical / Water
/ Mining



KV CONTROLS

Total Cost of Ownership

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