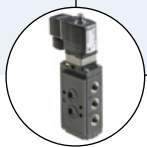


3/2-way Quarter-Turn ball valve in PVC with pneumatic actuator



Shown with proximity switch mounted

Type 2658 can be combined with...



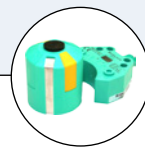
Type 6519 Namur
Pilot valve, direct mount to actuator



Type 8792
Digital positioner



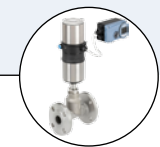
Type 8644
AirLINE control system



Prox switch
Feedback; shown mounted above



Type 2000
Classic angle seat valve



Type 8802
ELEMENT control valve & positioner

Complete ball valve system Type 2658 consists of a pneumatic quarter turn actuator and a plastic (PVC standard) ball valve. The connection between the actuator and the ball valve takes place via an ISO interface (flange connection), which is standard for all Bürkert quarter turn valves.

This datasheet refers to the 3/2 way version.

The compact, pneumatically actuated ball valve can be employed for a wide range of applications, even under heavy-duty, slightly aggressive conditions.

Other actuator types available, please call.

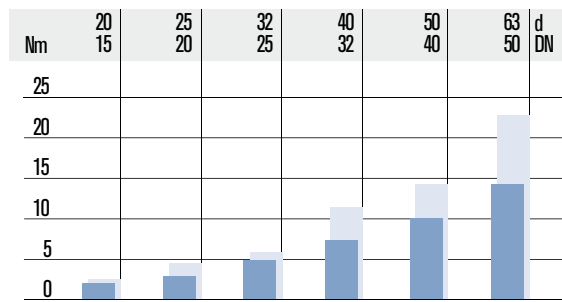
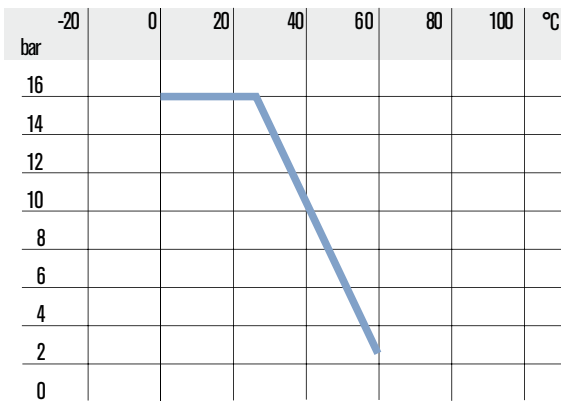
Applications

- Chemical processes
- Pure water processes
- Water treatment
- Cleaning machines
- Washdown areas

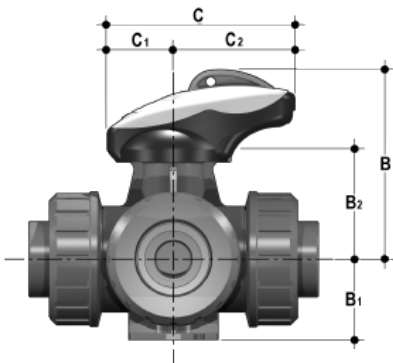
- For aggressive & pure process media
- Valve & actuator with high chemical resistance
- Long service life
- Complete accessory range available

Technical data	
Orifice	DN 15 - 50 standard range (larger sizes on request)
Body Material	PVC (PP, PVDF and other thermoplastics on request)
Actuator material	Polyamide (see chart in following pages)
Valve seal material	PTFE
Media	Gaseous and liquid media, consistent with the chemically resistant plastics of the valve
Media temperature	-10 to +120°C
Ambient temperature	-10 to +60°C
Control medium	Pneumatic air (neutral gases) Can be actuated with water & other neutral fluids
Port connection	Solvent ports 1/2" .. 2" Other sizes & port types on request
Pilot pressure	Double-acting actuator 3 .. 8 bar Spring-return actuator 3 .. 8 bar
Cycle time to open//close	Double-acting & Spring-return See chart
Connection between actuator and ball valve	Flange acc. to ISO 5211 or DIN 3337
Installation	As required, preferably with actuator in upright position

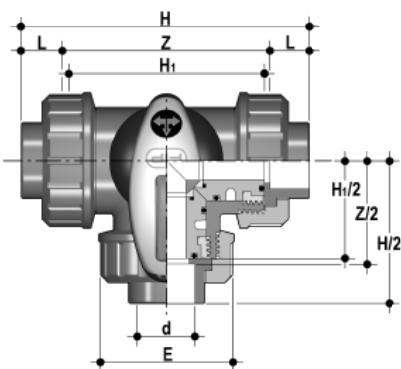
Valve: pressure temperature chart & torque chart



Valve: dimensions [mm]



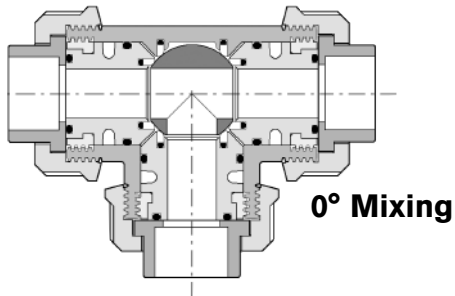
C	C1	C2	B	B1	B2
83.5	29.5	54	87.5	33	50
83.5	29.5	54	87.5	33	50
98	35.5	62.5	98.5	39	56.5
105	37	68	106	45	61.5
139.5	51	88.5	135	51	76.5
139.5	51	88.5	139	57	80.5
154	51	103	159	69	97.5



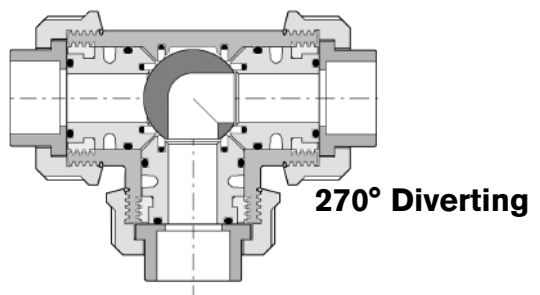
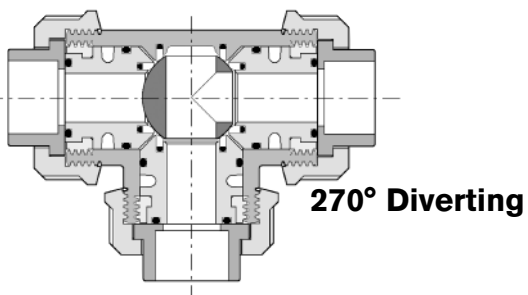
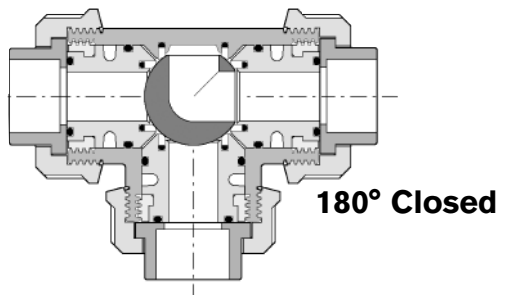
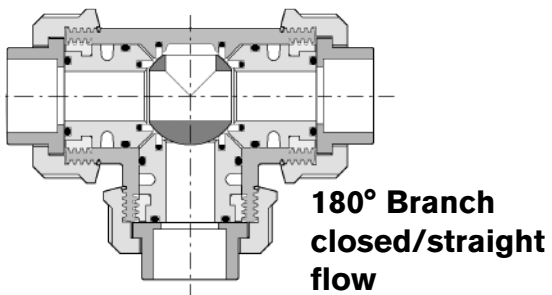
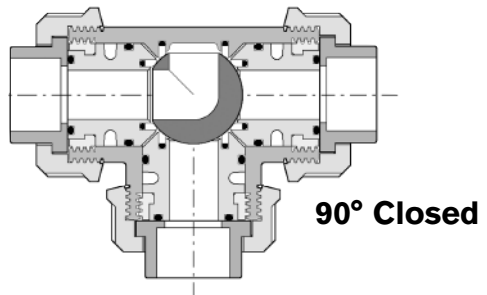
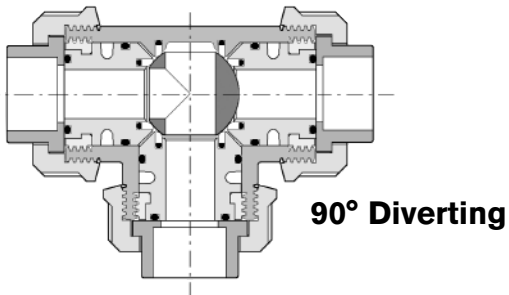
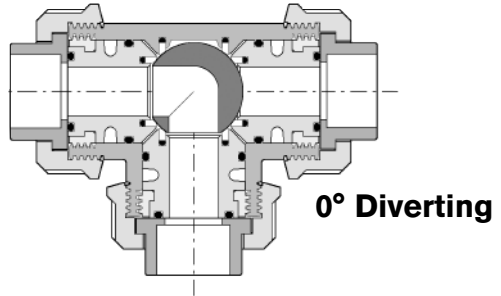
d	DN	PN	E	H	H1	L	Z	Kg
16	10	16	55	118	80	14	90	0.35
20	15	16	55	118	80	16	86	0.35
25	20	16	66	145	100	19	107	0.6
32	25	16	75	160	110	22	116	0.85
40	32	16	87	188.5	131	26	136.5	1.35
50	40	16	100	219	148	31	157	1.75
63	50	16	122	266.5	179	38	190.5	2.95

Valve: operating position

T Port Valves



T Port Valves



Technical: Type 2050 polyamide actuator for quarter turn valves

Double Acting & Spring Return options

The Bürkert polyamide rack and pinion actuator is highly resistant for chemical environments. These actuators are therefore indicated for strong chemical areas.

Polyamide throughout, the actuator is well suited to mounting with a PVC ball or butterfly valve. Such combinations offer significant logistical benefits due to the relatively low weight.

Accessories including limit switches, direct mount pilot valves, positioners and manual override

Ideal for use in chemical environments and where benefits of relatively low weight will be seen (where conditions allow).



Actuator cycle times

Model	Cycle time (seconds)		Weight [Kg]	Capacity [Litres]	
	Open	Close		Open	Close
PA00W (DA)	0.1	0.1	0.33	0.075	0.05
PA00W (SR)	0.15	0.15	0.47	0.075	
PA000 (DA)	0.15	0.15	0.76	0.15	0.1
PA000 (SR)	0.2	0.2	1.03	0.15	
PA010 (DA)	0.25	0.25	1.41	0.35	0.32
PA010 (SR)	0.3	0.3	2.15	0.35	
PA020 (DA)	0.4	0.4	2.94	0.8	0.7
PA020 (SR)	0.5	0.5	4.95	0.8	

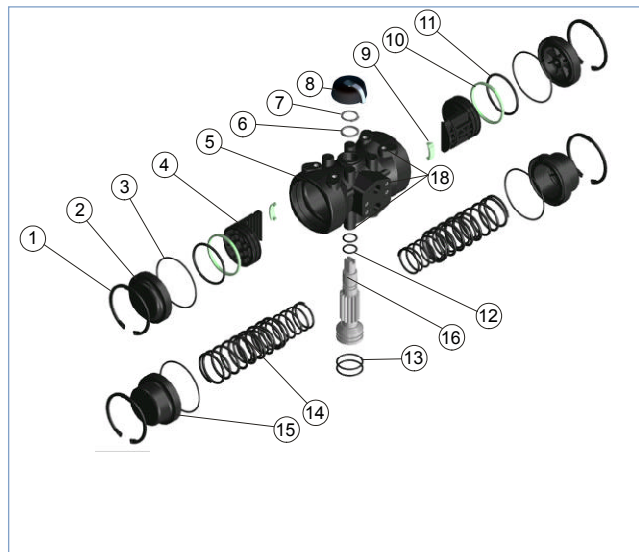
Actuator torques

Air pressure	Bar	3	4	5	6	7	8
PPW (DA)	Nm	7.9	11.3	14.1	17	19.8	22.9
PPOO (DA)	Nm	11.6	16.1	20.5	25	29.5	33.9
PP10 (DA)	Nm	32.9	45.6	58.3	71	83.7	96.4
PP20 (DA)	Nm	77.7	107	136.3	165.5	194.8	224

Unit size	Spring Torques		Air torque at indicated pressure, Nm									
			4		5		6		7		8	
			Initial	End	Initial	End	Initial	End	Initial	End	Initial	End
PA00W (SR)	10.4	6.5			7.5	3.6	10.6	6.7	13.6	9.7	16.4	12.5
PA000 (SR)	15.9	11.3			9.2	4.6	13.7	9.1	18.1	13.5	22.6	18.0
PA010 (SR)	46.6	32.3			26	11.7	38.7	24.4	51.4	37.1	64.1	49.8
PA020 (SR)	103.3	64.2			72.1	33.0	101.3	62.2	130.6	91.5	159.8	120.7

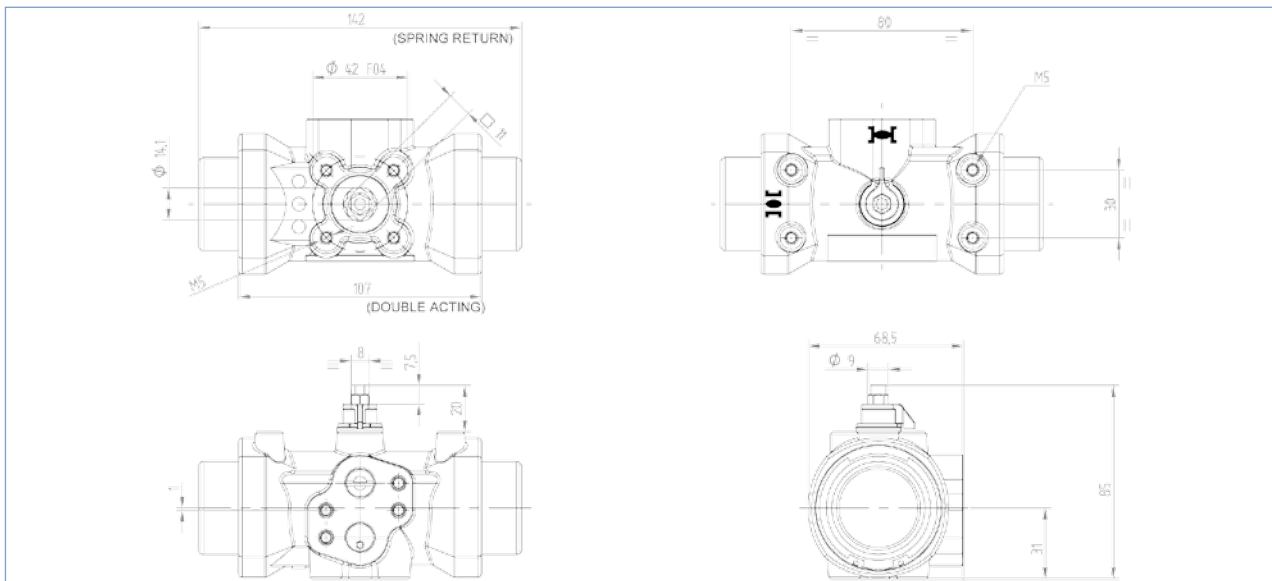
Actuator materials

Item	Description	Material
1	Spring Clip	Steel (Cataphoresis coated)
2	Double Acting Cap	PA / FV PA / FG
3	Cap O-ring	NBR
4	Piston	PA
5	Cylinder	PA / FV PA / FG
6	Washer	PA
7	Spring Clip	Stainless Steel
8	Visual Position Indicator	PA
9	Piston Guide	PA
10	Guide Ring	PA
11	Piston O-ring	NBR
12	O-ring	NBR
13	O-ring	NBR
14	Springs Set	DIN-17223-C (Cataphoresis coated)
15	Spring Return Cap	PA / FV PA / FG
16	Shaft	Stainless Steel
17	Thread Inserts	Stainless Steel



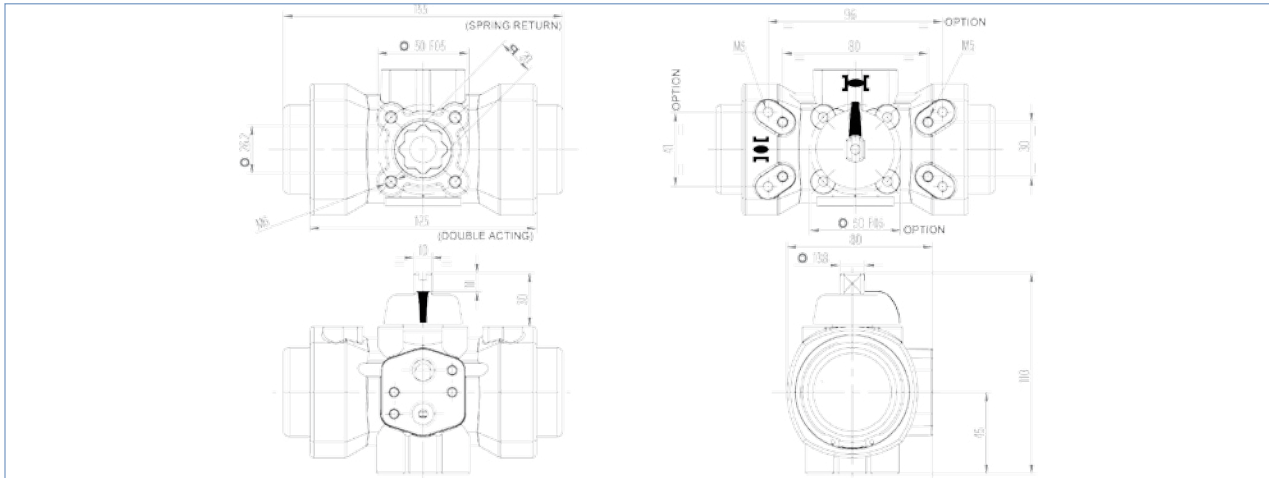
Dimensions

PA00W Model

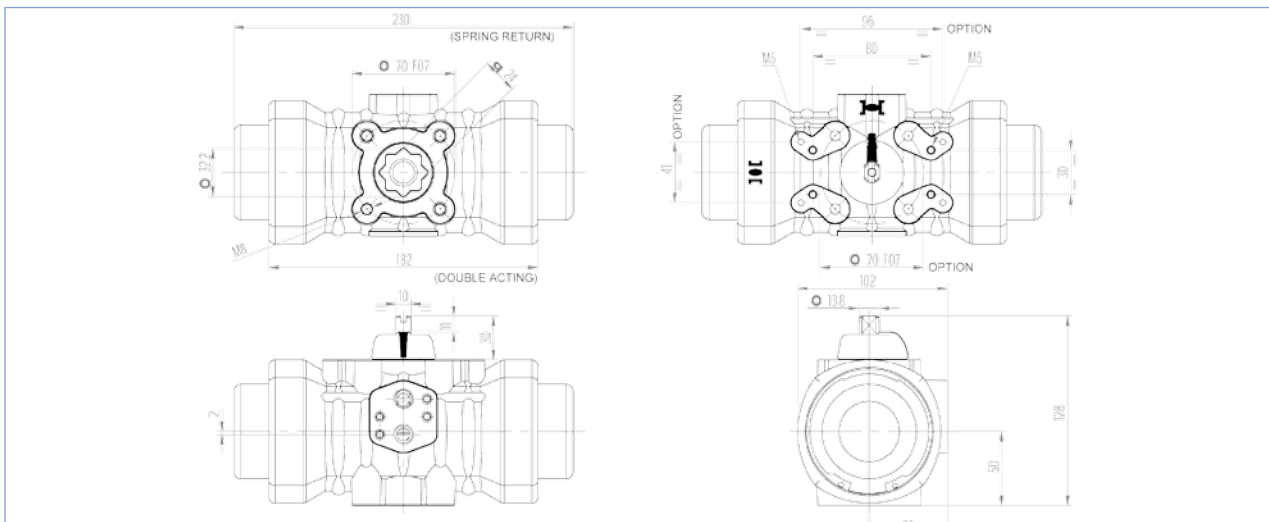


Actuator dimensions

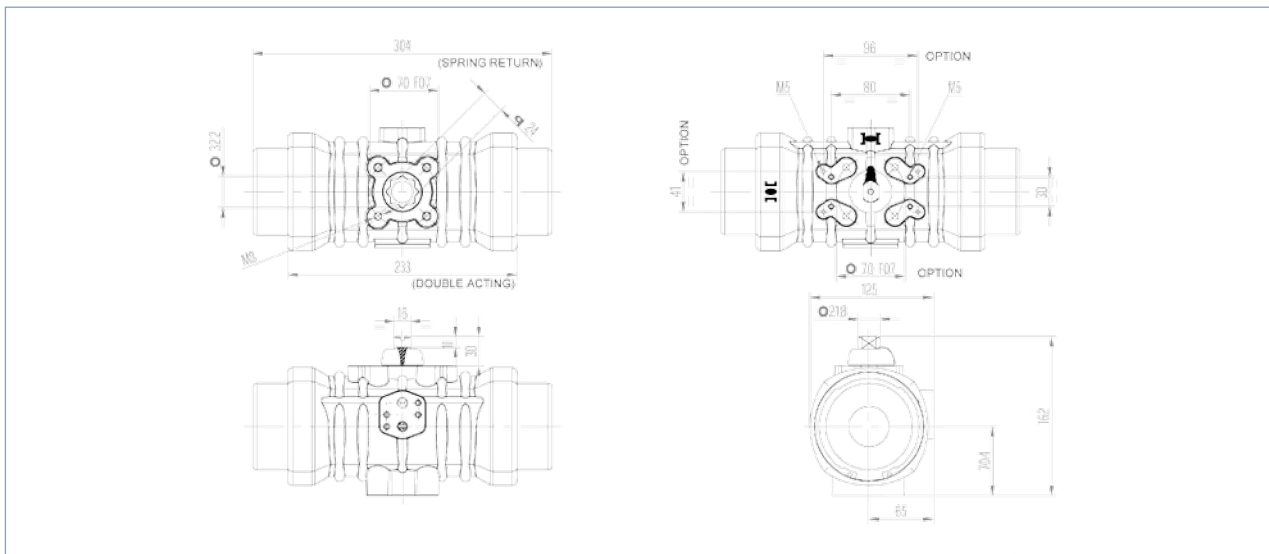
PA000 Model



PA010 Model




PA020 Model




Ordering chart for valves (other versions on request)

Pneumatically actuated 3/2-way ball valve with solvent ports; double acting

	Port Type	Orifice	Port Size	Pressure range	Port Config	Body material	Seal material	ID no.	Optional accessory size
Double Acting 3/2 Way L Port	15	1/2"	16 bar	L Port	PVC	PTFE	AU55037	Size 1	
	20	3/4"	16 bar	L Port	PVC	PTFE	AU55039	Size 1	
	25	1"	16 bar	L Port	PVC	PTFE	AU55041	Size 1	
	32	1 1/4"	16 bar	L Port	PVC	PTFE	AU55043	Size 1	
	40	1 1/2"	16 bar	L Port	PVC	PTFE	AU55045	Size 1	
	50	2"	16 bar	L Port	PVC	PTFE	AU55047	Size 2	
Double Acting 3/2 Way T Port	15	1/2"	16 bar	T Port	PVC	PTFE	AU55049	Size 1	
	20	3/4"	16 bar	T Port	PVC	PTFE	AU55051	Size 1	
	25	1"	16 bar	T Port	PVC	PTFE	AU55053	Size 1	
	32	1 1/4"	16 bar	T Port	PVC	PTFE	AU55055	Size 1	
	40	1 1/2"	16 bar	T Port	PVC	PTFE	AU55057	Size 2	
	50	2"	16 bar	T Port	PVC	PTFE	AU55059	Size 2	

Pneumatically actuated 3/2-way ball valve with solvent ports; spring return

	Port Type	Orifice	Port Size	Pressure range	Port Config	Body material	Seal material	ID no.	Optional accessory size
Spring Return 3/2 Way L Port	15	1/2"	16 bar	L Port	PVC	PTFE	AU55038	Size 1	
	20	3/4"	16 bar	L Port	PVC	PTFE	AU55040	Size 1	
	25	1"	16 bar	L Port	PVC	PTFE	AU55042	Size 1	
	32	1 1/4"	16 bar	L Port	PVC	PTFE	AU55044	Size 2	
	40	1 1/2"	16 bar	L Port	PVC	PTFE	AU55046	Size 2	
	50	2"	16 bar	L Port	PVC	PTFE	AU55048	Size 2	
Spring Return 3/2 Way T Port	15	1/2"	16 bar	T Port	PVC	PTFE	AU55050	Size 1	
	20	3/4"	16 bar	T Port	PVC	PTFE	AU55052	Size 1	
	25	1"	16 bar	T Port	PVC	PTFE	AU55054	Size 1	
	32	1 1/4"	16 bar	T Port	PVC	PTFE	AU55056	Size 2	
	40	1 1/2"	16 bar	T Port	PVC	PTFE	AU55058	Size 2	
	50	2"	16 bar	T Port	PVC	PTFE	AU55060	Size 2	



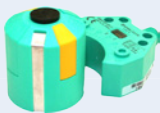
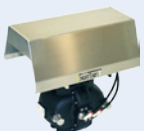
i Further versions on request Port Connection Approvals Temperature

Ordering chart for accessories for Type 2658 (to be ordered separately)

Type 2658 pneumatically actuated ball valves require pneumatic piloting. Standardised piloting kits for Type 2658 shown below. Variations available (eg all voltage variations available).

Item description	ID No		
	24V DC	240V AC	
For Direct Acting type	Type 6519 pilot solenoid valve with namur type service port and G1/4" air ports. Normally closed 3/2, 5/2 Way circuit function. PA body with stainless steel inserts.	131425	131428
	Type 2508 DIN Plug, with LED.	008360	008362
	Silencer, sintered bronze table type (male) for G1/4".	781889	
	Tubing, flexible nylon (Rilsan), per meter	AU03280	
For Spring Return type	Type 6014 pilot solenoid valve with G1/4" service port and G1/4" air ports. Normally closed 3/2 Way circuit function. PA/Brass/Aluminium body with FKM seal.	424103	424107
	Type 2508 DIN Plug, with LED.	008360	008362
	Silencer, sintered bronze table type (male) for G1/4".	781889	
	Tubing, flexible nylon (Rilsan), per meter	AU03280	

Type 2658 pneumatically actuated ball valve accessories. Top mounted switchbox, for visual position indication and protective hood.

Item description	ID No
 <p>Top mounted switch box, Size 1. For visual position indication. Aluminium die cast, polycarb.</p> <p>Top mounted switch box, Size 2. For visual position indication. Aluminium die cast, polycarb.</p> <p>Top mounted switch box, Size 3. For visual position indication. Aluminium die cast, polycarb.</p> <p>*NB All units on ordering chart indicate which size switch box suits with 'Optional Accessory Size'</p>	AU50858
	AU50606
	AU50607
 <p>Type 8793 electropneumatic positioner with integral PID controller. For Spring Return & Double Acting actuator type. Operating voltage 24V DC.</p> <p>Type 8791 Basic electropneumatic positioner. For Spring Return & Double Acting actuator type. Operating voltage 24V DC.</p>	On Request
	On Request
 <p>Dual proximity switch feedback for mount onto quarter turn valves. Size 1.</p> <p>Dual proximity switch feedback for mount onto quarter turn valves. Size 2.</p> <p>*NB Ordering chart indicates 'Optional Accessory Size' Size 3.</p>	AU46486
	AU46487
	AU46860
 <p>Type 1067 protective hood for quarter turn valves, stainless steel. Designed for protection from weather and sun to deliver long service life.</p>	AU33834

In case of special application conditions, please consult for advice.

We reserve the right to make technical changes without notice.
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