

2/2-Way Direct Operated Valve

General application valves for dry or lubricated air, neutral gases and liquids



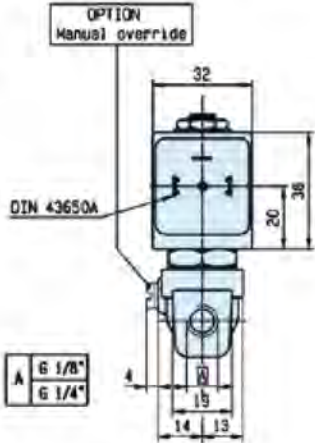
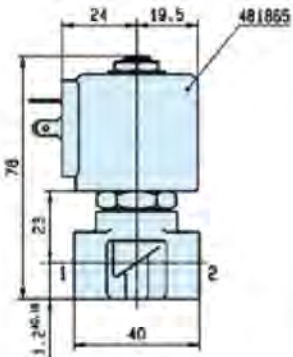
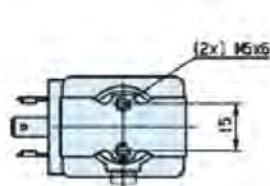
- Description:**
- 2/2-Way Direct Operated Valve - Normally Closed.
 - Coil IP65 for 2 P + E plug according to DIN 43650 type A
 - Power Consumption 8W (AC), 9W (DC).
- Applications:**
- Shut-off and control (On-Off) of water, air, light oils, steam and inert gases
 - Humidifiers, welding systems, industrial washing machines, automatic dispensers, diesel oil burners, sterilizers, compressors.
- Temperature Range:**
- Min: -10°C | Max: see table
- Seals Material:**
- See table
- Advantages:**
- Versatile product for many 2/2 NC valve requiring applications, robust design.

Port size	Orifice	K _v	Admissible differential pressure (bar)			Fluid Temp.	Seal Material	Reference number			Options
			Min.	Max. DC	Max. AC			Valve	Housing	Coil	
G	mm	l/min				°C					

2/2-Way Direct Operated Valve											Normally CLOSED
1/8"	2.5	3.50	0	10.0	28.0	100°C	Ruby ¹	E121K23	2995	481865	-
1/8"	3.0	4.50	0	7.0	10.0	100°C	FKM	121K1302	2995	481865	-
1/4"	1.2	0.85	0	36.0	80.0	100°C	Ruby ¹	E121K65	2995	481865	-
1/4"	1.5	1.50	0	25.0	60.0	75°C	PCTFE	E121K04	2995	481865	-
1/4"	1.5	1.50	0	25.0	60.0	100°C	Ruby ¹	E121K67	2995	481865	-
1/4"	1.5	1.50	0	20.0	20.0	100°C	FKM	E121K0402	2995	481865	-
1/4"	2.5	3.50	0	10.0	28.0	75°C	PCTFE	E121K07	2995	481865	-
1/4"	2.5	3.50	0	7.0	14.0	100°C	FKM	121K0706	2995	481865	-
1/4"	2.5	3.50	0	10.0	28.0	100°C	Ruby ¹	E121K63	2995	481865	-
1/4"	3.0	4.50	0	7.0	20.0	75°C	PCTFE	E121K03	2995	481865	-
1/4"	3.0	4.50	0	7.0	10.0	100°C	FKM	E121K0302	2995	481865	-
1/4"	3.0	4.50	0	7.0	10.0	100°C	EPDM	121K0323	2995	481865	-
1/4"	3.0	4.50	0	7.0	10.0	100°C	FKM	E121K0352	2995	481865	**
1/4"	3.0	4.50	0	7.0	20.0	100°C	Ruby ¹	E121K64	2995	481865	-
1/4"	4.0	7.50	0	4.0	10.0	100°C	FKM	121K02	2995	481865	-
1/4"	4.0	7.50	0	4.0	10.0	100°C	FKM	121K0250	2995	481865	**
1/4"	5.0	11.00	0	2.0	7.0	100°C	FKM	121K01	2995	481865	-
1/4"	5.0	11.00	0	2.0	7.0	100°C	EPDM	121K0103	2995	481865	-
1/4"	5.0	11.00	0	2.0	7.0	100°C	FKM	121K0150	2995	481865	**
1/4"	5.0	11.00	0	2.0	7.0	100°C	FKM	121K3106	2995	481865	-
3/8"	4.0	7.50	0	4.0	10.0	100°C	FKM	121K3206	2995	481865	-
3/8"	6.0	12.00	0	1.1	5.0	100°C	FKM	121K3303	2995	481865	-
3/8"	6.0	12.00	0	1.1	5.0	100°C	FKM	121K3306	2995	481865	-
1/2"	8.5	25.00	0	0.5	1.1	100°C	FKM	E121K46	2995	481865	-
1/2"	11.0	36.00	0	0.3	0.7	100°C	FKM	E121K45	2995	481865	-

¹ Valve with Ruby seal is only compatible with hydraulic oil and neutral liquids

** Manual override standard



2/2 & 3/2 Solenoid Valves for High Pressure pneumatic applications - 40 bar

Product offering:

- 2/2 valves and 3/2 way valves - pilot operated
- Pipe mounting (G 1/2- 3/4) or sub-base mounting
- 1.5 (2) - 40 bar
- Normally open or closed
- Internal or external pilot pressure supply

Customer Value Proposition:

- Safety of operation
- Reliability
- Response time stability
- Repeatability
- No leakage
- Integrated non return valve (421version)



The use of high pressure gases became a necessity in the new technologies developed during the last years.

The control of these fluids can be done through the solenoid valves specially designed by Parker Lucifer for high pressure applications (maximum 50 bar).

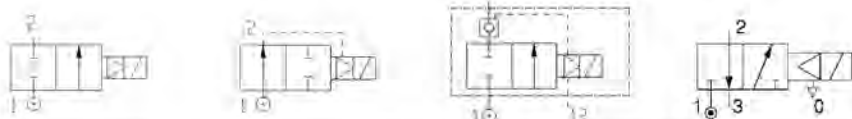
The **life expectancy of several millions** of cycles, with **response time of few milliseconds**, allows the use of these valves on intensive applications and on high technology machines, as the plastic bottle blowing machines, or the laser cutting machines.



Parker Lucifer also develops special valves or adapted blocks upon specific customers needs. Please contact your agent for more information.

Application Example

Main Technical Specifications

Function	2/2 pilot operated: Normally closed (with internal pilot pressure) 321H/F type Normally closed (with external pilot pressure) 421H/F type Normally open (with internal pilot pressure) 322H/F type 3/2 pilot operated: normally closed (with internal pressure) 331B type
ISO diagram	321H/F 322H/F 421H/F 331B 
Mounting	- For direct pipe mounting G 1/2" or 3/4" (2/2 Valve type H); G 1/4 (3/2 Valve type B) - For sub-base mounting (type F)
Nominal diameter	15 mm (type H), 14 mm (type F)
Pressures	For the version with external pilot pressure, the pilot pressure must always be higher than the controlled pressure
External Leakage	0 Ncc/min.
Internal Leakage	< 20 Ncc/min.
Fluids	Dry lubricated or non lubricated air, Argon, Nitrogen. Oxygen on request
Proof pressure	200 bar
Filtration	< 1 µm
Life expectancy	> 2 10 ⁶ cycles (dry and clean air) > 8 10 ⁵ cycles (lubricated air)
Temperatures	Ambient / fluid mini: -10 °C Ambient / fluid maxi: +50 °C
Materials specifications	Body/cover: 2/2 Valves: Brass - 3/2 Valves: Aluminium Pilot seals : PUR Main seals : FKM (Viton®) with isolating diaphragm from PUR Tube and plunger : Stainless steel Coil : Encapsulation from PA66 + 30% fiber glass
Options	Δp maxi 50 bar on request
Response Time	Depends on application
Mounting Position	Indifferent
Specials	Parker-Lucifer also develops special valves or adapted blocks upon specific customers needs. Please contact your agent for more information.

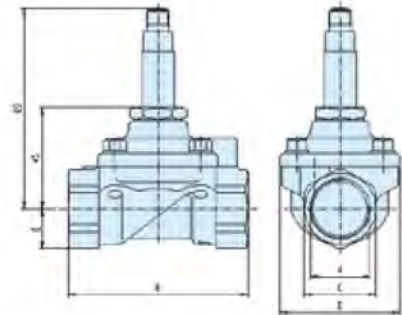
Port size	Orifice	Flow Factor (l/min)	Admissible differential pressure (bar)			Fluid Temp.	Seal Material (C°)	Global Ref. No.	Reference number			Dim. Ref. N°
			Min.	Max. DC	Max. AC				Valve	Housing	Coil	
G	mm	Gaz Qn				Gaz Max.						
2/2 Valves - Direct Pipe Mounting											Normally CLOSED	
1/2"	15	3150	1.5	40	40	50	FKM	-	321H35	2995	481865	1
3/4"	15	3550	1.5	40	40	50	FKM	-	321H36	2995	481865	1
2/2 Valves - Direct Pipe Mounting											Normally OPEN	
1/2"	15	3150	1.5	40	40	50	FKM	-	322H35	2995	481865	2
3/4"	15	3550	1.5	40	40	50	FKM	-	322H36	2995	481865	2
2/2 Valves - Direct Pipe Mounting											External Pilot	Normally CLOSED
1/2"	15	3150	2	40	40	50	FKM	-	421H35	2995	481865	3
3/4"	15	3550	2	40	40	50	FKM	-	421H36	2995	481865	3
2/2 Valves - Sub-base Mounting											Normally CLOSED	
-	14	2100	1.5	40	40	50	FKM	-	321F35	2995	481865	4
-	22	7000	5	40	40	50	FKM	-	321F37	2995	481865	-
2/2 Valves - Sub-base Mounting											Normally OPEN	
-	14	2100	1.5	40	40	50	FKM	-	322F35	2995	481865	5
-	22	7000	1.5	40	40	50	FKM	-	322F37	2995	481865	-
2/2 Valves - Sub-base Mounting											External Pilot	Normally CLOSED
-	14	2100	2	40	40	50	FKM	-	421F35	2995	481865	6
3/2 Valves - Direct Pipe Mounting											Normally CLOSED	
1/4"	8	750	1	40	40	50	PUR	-	331B31	2995	481865	7
3/2 Valves - Sub-base Mounting											Normally CLOSED	
-	8	750	1	40	40	50	PUR	-	331F31	2995	481865	-

Available electrical parts:

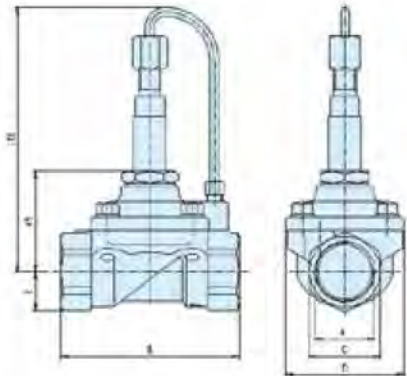
You will find standard available coil details on the next pages.

Dimensions

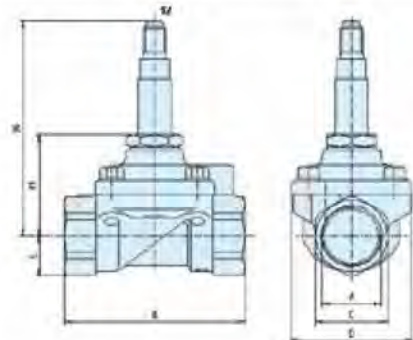
Dimensions Reference N° 1



Dimensions Reference N° 2

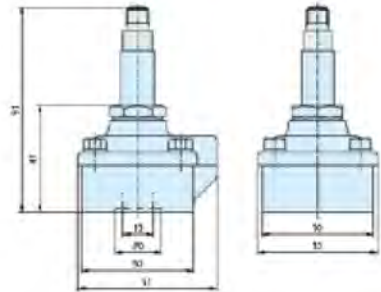


Dimensions Reference N° 3

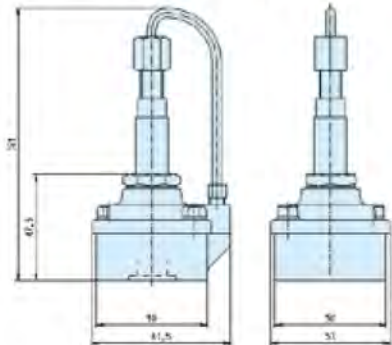


	A	B	C	D	E
G3/4"	80	32	53	17.5	
G1/2"	75	27	53	13.5	

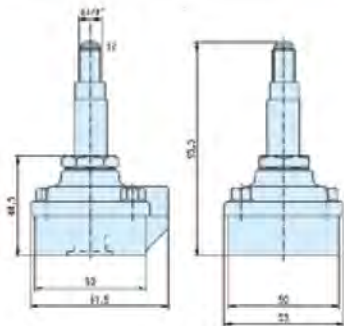
Dimensions Reference N° 4



Dimensions Reference N° 5



Dimensions Reference N° 6



Dimensions Reference N° 7

