



ROTAREX

FIRETEC

90 YEARS

1922 - 2012

N2 (IG-100) GAS FIRE SUPPRESSION SYSTEMS



NFPA 2001 : Standard
on Clean Agent
Fire Extinguishing System

IMPERIAL

FIRE ENGINEERING

The Expert in Fire Protection System

PRESSURE REGULATOR TECHNOLOGY

Rotarex Pressure Regulators modulate the discharge pressure to a constant 40-60 bar which still delivers the design concentration within 60 seconds, but with significant performance and cost benefits:

BETTER SAFETY:

- Prevents discharge freeze-up
- Prevents explosive force of discharge

SAVES TIME AND MONEY:

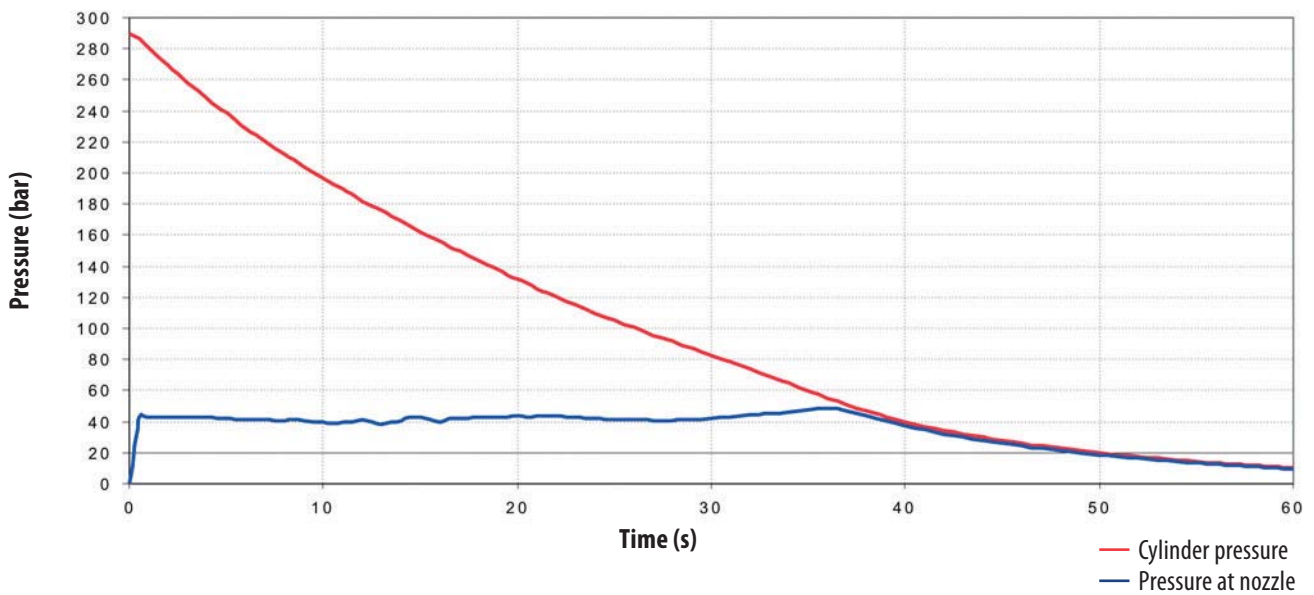
- Enables low pressure manifolds & pipework to be used - that are lower cost and easy to install
- Reduces the difficulty and cost of locating/fitting pressure vents in the protected space

EASY MAINTENANCE:

- After a system discharge, simply remove the regulator, recharge, and reconnect. No reconditioning necessary
- Functional tests are possible even while the system is armed



Design software available



SOFTWARE AVAILABILITY

Design software is available to calculate fire suppression systems to ISO 14520, Vds 2380 and NFPA 2001.

80L CYLINDER/VALVE ASSEMBLY FOR 300 BAR N2 GAS

A complete ready-to-fill cylinder/valve assembly.
 - Empty 80L cylinder for 300 bar inert gases
 - B0480 cylinder valve and
 - steel protection cap



High Pressure cylinder valves for 300 bar inert gas fire suppression systems.

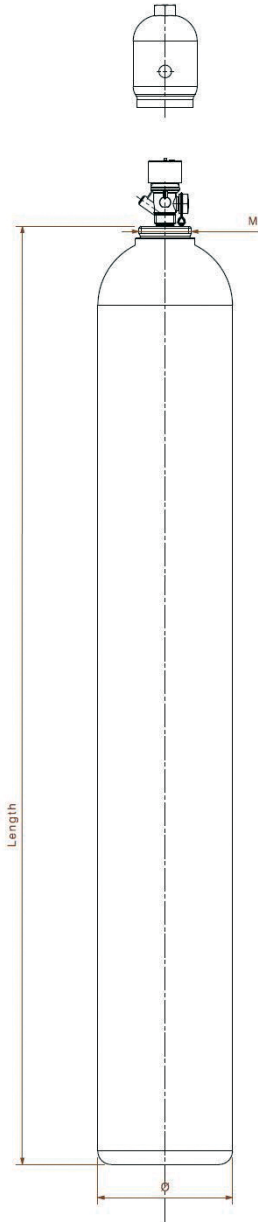
KEY FEATURES

- Available in 300 bar versions
- Requires one of 4 actuator device options
- Special connections available on request



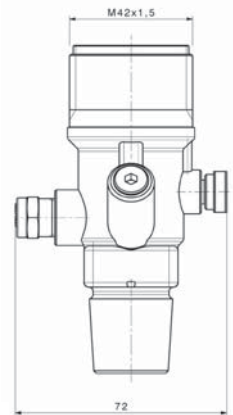
300 bar

Product code **B04808000**



300 bar

Product code **B04802007**



PROVEN TECHNOLOGY

Rotarex is the world leader in high-performance cylinder valves for fixed extinguishing systems as well as Ultra High Purity, Medical, Cryogenic, Automotive and LPG applications. They leverage 90-year expertise, vast R&D infrastructure and global scale to provide the most technically advanced and dependable fire suppression valves in the market. Trust Rotarex valves to perform when it most counts.

Rotarex recommends its high-performance Series B0480 valve technology for 200/300 bar inert gas systems. Over 200,000 valves are already in service.

SPECIFICATIONS

Working pressure	300 bar versions	Weight empty	≈ 103 Kg
Seamless Steel Cylinder	Water volume 80l	Length w/o cap	1760 ± 20mm
Gas to be filled*	IG 01, IG 55, IG 100, IG 541	Diameter	267 mm ± 1%
Test pressure	450 bar		

*Standard not filled

SPECIFICATIONS

Working pressure p max.	300 bar versions	Inlet connection	C = 25E EN-629-1
Temperature range	-20°C to +60°C	Outlet connection	A = W21,8 x 1/4" DIN 477
Seat orifice size	12 mm	Dip tube connection	G = M 16 x 1
Valve body	Brass	Standard burst disc	p = 450 bar

CONSTANT DISCHARGE PRESSURE REGULATOR

Pressure Regulator to create a more constant flow during discharge to prevent line freezing



KEY FEATURES

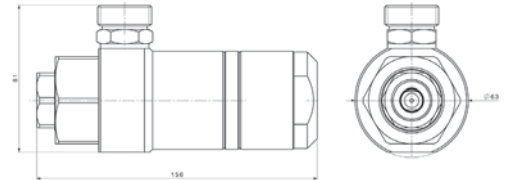
- Reduces discharge pressure to a pre-set pressure (60 bar)
- Attaches to the valve discharge port
- Helps prevent blockage due to line freezing
- Helps reduce pressure blow-outs and venting requirements
- VdS certified



Product code | B0840002



Mounts on B0480 valve



SPECIFICATIONS

Nominal inlet pressure	300 bar	Inlet connection	A = W21,8 x 1/4" DIN 477	Dynamic outlet pressure	see chart
Max inlet pressure	360 bar	Outlet connection*	C = M30x2	Static outlet pressure	60 bar
Inlet orifice size	12 mm				

Special thread options available on request

MANUAL RELEASE DEVICE

Device to actuate the release of extinguishing agent.

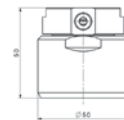
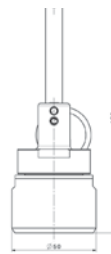
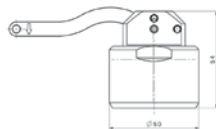
For use with Series B0480 valves.



MANUAL RELEASE DEVICE

MANUAL/PNEUMATIC RELEASE DEVICE

PNEUMATIC RELEASE DEVICE -20 BAR



For manual actuation of the system
Can be used with electromagnetic actuators

- For both manual and pneumatic actuation
- Can be used as master valve with pneumatic connections to additional cylinders via a pilot hose

- For pneumatic actuation of the system
- Attaches to master valve via a pilot hose in a multiple cylinder configuration

Product code	B04420100	B04420065	B04420066
Working pressure	300 bar	300 bar	300 bar
Valve connection	M42 x 1,5	M42 x 1,5	M42 x 1,5
Pneumatic connection	-	G1/8"	G1/8"
Actuation force/pressure	150N	20 bar for 300 bar systems: p max = 340 15 bar for 200 bar systems: p max = 250	20 bar for 300 bar systems: p max = 340 15 bar for 200 bar systems: p max = 250

ELECTROMAGNETIC RELEASE DEVICE

Device to electronically actuate the release of extinguishing agent.

For use with Series B0480 valves

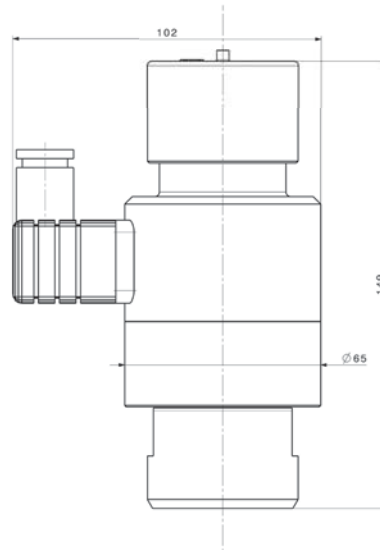
KEY FEATURES

- Most commonly used as a master valve to actuate the system electronically, such as with connection to a smoke or heat detection device
- Electronically actuates the release of extinguishing agent



WITH DIODE AND WITHOUT DIODE

WITH BLOCKING DEVICE



B04425131

B04425132

B04425129

	WITH DIODE	WITHOUT DIODE	WITH BLOCKING DEVICE
Valve connection	B = M42 x 1,5	B = M42 x 1,5	B = M42 x 1,5
Nominal voltage	24 VDC	24 VDC	24 VDC
Electrical connection			PG 9
Nominal current	0,5 A	0,5 A	0,5 A
Protection Class	IP65	IP65	IP65

Special thread options available on request

*Applies to versions B04425131 and B04425132

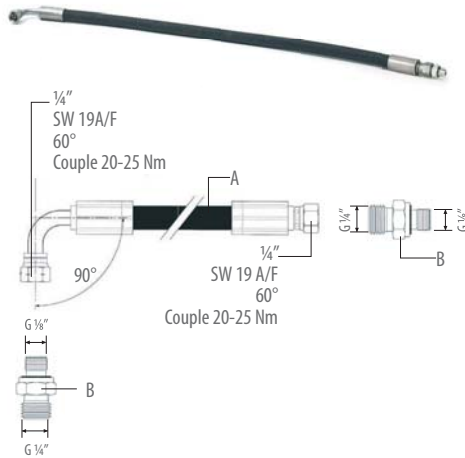
PILOT HOSES

Hose to connect multiple cylinders in a series.

Connects a master valve or a pneumatic actuator with an other pneumatic actuator

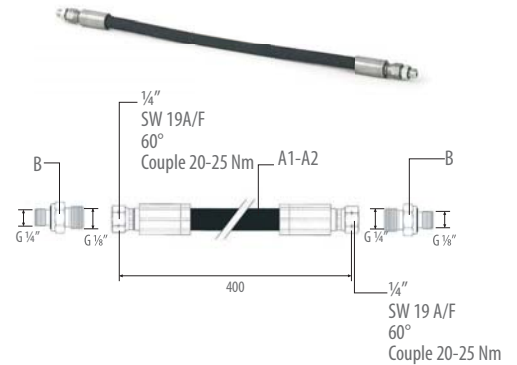
VdS

90° PILOT HOSE



- One end has a 90°elbow fitting
- 400 bar working pressure
- Adapter B must be ordered separately (one for each hose end)

STRAIGHT PILOT HOSE



- Both ends have a straight fitting
- 350 bar working pressure

	Product code	Length l	Connection	Bending radius
A	B06920209	500 mm	1/4" - BSP	75 mm
Adapter B	026300304		1/4" BSP - G 1/8 with O-ring	

	Product code	Length l	Connection	Bending radius
A1	B06920211	400 mm	1/4" - BSP	75 mm
A2	B06920212	700 mm	1/4" - BSP	75 mm
Adapter B	026300304		1/4" BSP - G 1/8 with O-ring	

SPECIFICATIONS

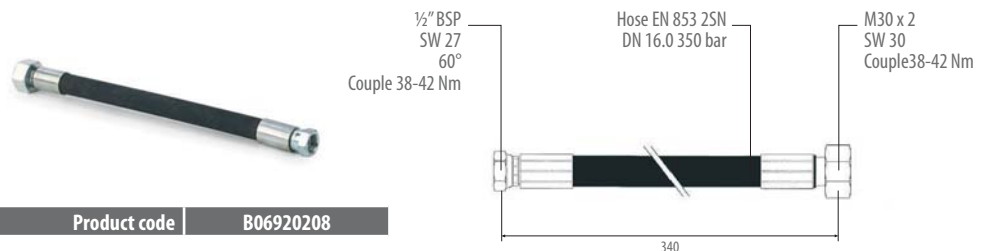
Working pressure	400 bar	Temperature Range	-40°C to 100°C	Interior diameter	1/2"
Burst pressure	1600 bar	Material	Synthetic rubber oil resistant	Norm	EN 857 2 SC
Torque	20-25 Nm				

DISCHARGE HOSE

Hose to connect the cylinder valve to the manifold in fixed fire suppression systems.

350 bar working pressure.

VdS



Product code | B06920208

SPECIFICATIONS

Working pressure	350 bar	Material	Synthetic rubber oil resistant	Check valve connection (outlet)	1/2" BSP
Burst pressure	1400 bar	Norm	EN 853 2 SN	Bending radius	180 mm
Temperature range	-40°C to 100°C	Length L	340 mm	Interior diameter	1/2"
Torque	38-42 Nm	Valve connection (inlet)	M30x2		

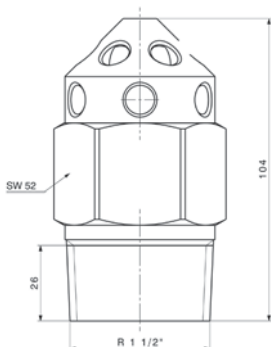
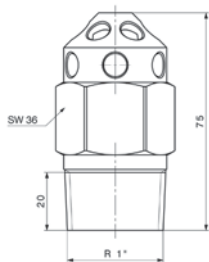
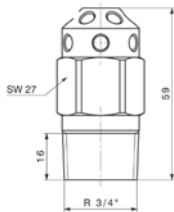
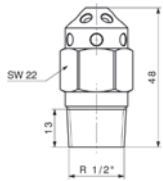
DISCHARGE NOZZLES

Brass discharge nozzles for inert gas systems.

VdS

KEY FEATURES

- Max. working pressure 300 bar
- Material: brass
- Special orifice diameters available on request



Size of thread	Product code	Orifice Diameter
1/2" BSP	B04611100	3
	B04611101	4
	B04611102	5
	B04611103	6
	B04611104	7
	B04611105	8
	B04611106	9
3/4" BSP	B04611107	10
	B04611200	7
	B04611201	8
	B04611202	9
	B04611203	10
	B04611204	11
	B04611205	12
1" BSP	B04611206	13
	B04611207	14
	B04611300	10
	B04611301	11
	B04611302	12
	B04611303	13
	B04611304	14
1 1/2" BSP	B04611305	15
	B04611306	16
	B04611307	17
	B04611308	18
	B04611400	15
	B04611401	16
	B04611402	17
	B04611403	18
	B04611404	19
	B04611405	20
	B04611406	21
B04611407	22	
B04611408	23	
B04611409	24	
B04611410	25	
B04611411	26	

DIRECTIONAL VALVE

Valve and actuator assembly to isolate separate protection zones from the same cylinder rack.

Permits discharge only in the zone with the fire.



KEY FEATURES

- Choice of 4 diameters: 1" / 1½" / 2" / 3"
- Actuates system discharge electronically or manually



	1"	1½"	2"	3"
Product code	B06300700	B06300701	B06300702	B06300703

VALVE SPECIFICATIONS

Working Pressure	100 bar
Type	Ball valve 2 way
Material	Carbon Steel
Weight	1": 3.45 Kg 1½": 8.07 Kg 2": 10.15 Kg

Valve and actuator available as separate component on request

ACTUATOR SPECIFICATIONS

Voltage	12-24 V AC/DC
Current	12 V DC/2.90A - 24 V DC/ 1.35A
Operating time	90°/12 seconds no lead
Max operating torque	35 Nm
Working angle	90°
Statut indicator	LED
Output	2 micro switches and line end of travel confirmation
Protection	Electronic over-torque protection / valve jams
IP Rating	IP 65

*VDS version available

IMPERIAL

FIRE ENGINEERING

The Expert in Fire Protection System

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