



12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

MECAIR - 12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

PRODUCT LEAFLET



DESCRIPTION

The 3" CA76MR, RCA76MR and the 2½" CA62MR and RCA62MR pulse-jet valves are designed for direct mounting to nominal 12" diameter cylindrical manifolds. The 40MMR is designed for nominal 6" diameter manifolds. The 62MR, 76MR and 40MMR valves deliver very high flow performance and are suited to reverse pulse-jet dust collector applications for a wide range of installations. The MR range is built to an exceptional quality standard and is supported by dedicated and experienced applications engineers.

SUITABLE FOR

Mounting to 12" nominal diameter pipe schedule steel or stainless steel manifolds in dust collector applications in reverse pulse-jet filter cleaning. Typical applications include bag filters, cartridge filters, envelope filters, ceramic filters and sintered metal fibre filters.

The MR Series valves are available for purchase in three configurations – as a stand-alone valve, with an outlet pipe,

or assembled to a manifold as part of a complete filter cleaning solution.

APPROVALS

- 76MR CRN – Alberta (to 632 kPa/91.1 psi, 80°C/176°F)

INSTALLATION

1. The valves are installed through the tank.
2. To avoid any potential operational problems it is preferable that the valves are not mounted underneath the tank where condensation may collect. All O-rings should be coated with a silicone-based lubricant or similar.
3. Tighten pipe outlets to 340 Nm (251 ft-lbs).
4. Make electrical connections to solenoid or connect RCA pilot port to pilot valve (RCA valves only).
5. Ensure compressed air supply is dry and

free from oil and dirt.

6. Check all cleaning system components are secure before applying pressure.
7. Apply moderate pressure and check for leaks.
8. Fully pressurise system.
9. Test fire and listen for proper actuation and crisp pulse noises.

Note: Minimum valve-to-valve separation distance must be considered with due regard to the applicable pressure vessel design code (e.g. ASME, PED) and the required tank

CONSTRUCTION AND SPECIFICATIONS

TOP COVER	Diecast aluminium
BODY	Diecast aluminium
FERRULE	305 SS
ARMATURE	430FR SS
DIAPHRAGM AND SEALS	Nitrile or Viton
SPRING	304 SS
SCREWS	302 SS and 304 SS
OUTLET PIPE	Schedule 40 wrought steel with surface protection (other materials on request)
DIAPHRAGM SEAT:	Nitrile encapsulated mild steel or Viton encapsulated mild steel

WEIGHTS

SIZE	INTEGRAL PILOT (CA) KG (LB)	REMOTE PILOT (RCA) KG (LB)
76MR	4.27 kg (9.41 lb)	4.05 kg (8.93 lb)
62MR	4.58 kg (9.41 lb)	4.36 kg (8.93 lb)
40MMR	1.63 kg (3.59 lb)	1.41 kg (3.11 lb)

PRODUCT CHARACTERISTICS AND PERFORMANCE

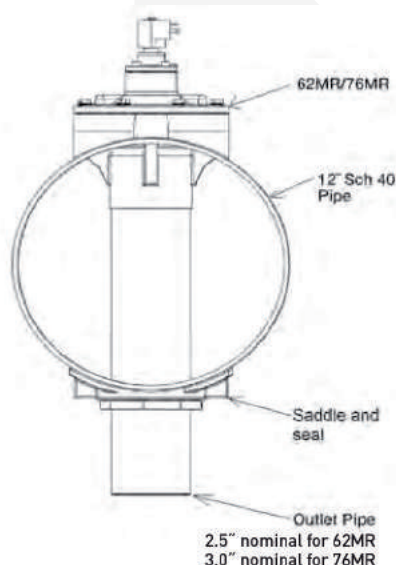
SIZE	FLOW KV (CV)	PRESSURE RANGE KPA (PSI)*	TEMPERATURE RANGE °C (°F)*	
			NITRILE SEALS	VITON SEALS
76MR	200 (233)	30 kPa/5 psi to 860 kPa/125 psi	-40°C (-40°F) to 82°C (179.6°F)	-29°C (-20.2°F) to 232°C (449.6°F)
62MR	150.7 (175.2)	30 kPa/5 psi to 860 kPa/125 psi	-40°C (-40°F) to 82°C (179.6°F)	-29°C (-20.2°F) to 232°C (449.6°F)
40MMR	150.7 (175.2)	30 kPa/5 psi to 860 kPa/125 psi	-40°C (-40°F) to 82°C (179.6°F)	-29°C (-20.2°F) to 232°C (449.6°F)

MECAIR - 12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

PRODUCT LEAFLET

62MR/76MR CONFIGURATIONS WITH OUTLET PIPE, WITHOUT MANIFOLD



ORDER CODE

Pilot type	RCA	76MR	12	0	0	0	000	Solenoid type
RCA=remotely piloted CA=integral pilot								Solenoid order code for CA valve, drop the 'K-'. Refer to Q Series Solenoid product specification.
Valve size								Diaphragm material
62MR 76MR								0=Nitrile 1=Viton
Nominal tank width								Pilot thread type
12"								0=NPT 1=RC Specify 4 for CA models.
Remote pilot size								
0=1/8" 1=1/4" Specify 0 for CA models.								

OPERATION

Recommended on-time range: 50 to 500 ms.
Recommended time between pulses: 1 minute or greater.

MAINTENANCE

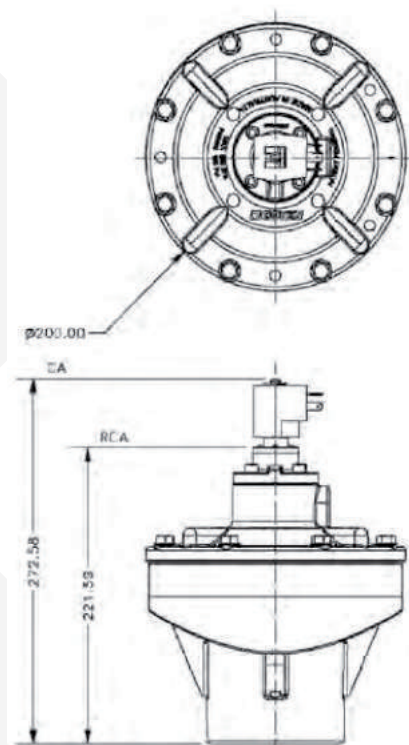
Before conducting any maintenance activity on the system ensure that components are fully isolated from pressure and power supplies. Pressure and power should not be reapplied until the valve has been fully assembled. Diaphragm and pilot inspection should be conducted annually.

MAINTENANCE KITS

MODEL	NITRILE	VITON
CA/RCA76MR Diaphragm Kit	K7600	K7601
Pilot Repair Kit for all models	K0380	K0384
CA/RCA62MR Diaphragm Kit	K7604	K7602

- Diaphragm kits include main and secondary diaphragms and all diaphragm springs.
- Pilot repair kit includes O-ring, armature assembly, armature spring and ferrule.

MODEL	NOMINAL PORT SIZE	NO. DIAPH.	PRESSURE RANGE (BAR)		COIL	KV	CV
			MIN.	MAX.			
CA62MR	2.5"	2	0.3	8.6	Yes	150.7	175.2
RCA62MR	2.5"	2	0.3	8.6	No	150.7	175.2



Pilot type	RCA	40MMR	6	1	2	0	-	Solenoid type
RCA=remotely piloted CA=integral pilot								Solenoid order code for CA valve, drop the 'K-'. Refer to Q Series Solenoid product specification.
Nominal tank size								Diaphragm material
40 mm 6"								0=Nitrile 1=Viton
Remote pilot size								Pilot thread type
0=1/8"								0=NPT 1=RC 2=G

MECAIR - 12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

PRODUCT LEAFLET

INFORMATION WHEN ORDERING 62/76MR COMPLETE WITH MANIFOLD



TANK TEMPERATURE & PRESSURE RANGES

CARBON STEEL	-40°C to 110°C	-40°F to 230°F
STAINLESS STEEL	-50°C to 93°C	-58°F to 199°F
PRESSURE RANGE	100 kPa to 800 kPa	14.5 psi to 116 psi

TANK CERTIFICATIONS AVAILABLE



ORDER CODE

Goyen		62MR 76MR		2 0		N04		P211		XXX	
Piloting		R=RCA C=CA								3PV pilot	
Threading		0=NPT 1=RC 2=G								M3 Dual rating: 110 V DC 18 W or 220 V/240 V 50/60 Hz 46/37 VA	
Diaphragm		0=Nitrile 1=Viton								M4 Dual rating: 48 V DC 18 W or 115 V 50/60 Hz 63/53 VA	
Number of valves										M5 Dual rating: 24 V DC 18 W or 48 V 50/60 Hz 41/32 VA	
										M6 Dual rating: 12 V DC 18 W or 24 V 50/60 Hz 38/31 VA	
										QR solenoid pilot	
										300 200/240 V 50/60 Hz	
										301 100/120 V 50/60 Hz	
										305 24 V DC DC	
										Pitch	
										N01, N02, etc.	
										Refer to 12" Nominal Pitch table below.	

More options available below. See 'Voltage Range QR Series' table.

12" MINIMAL PITCH DISTANCES

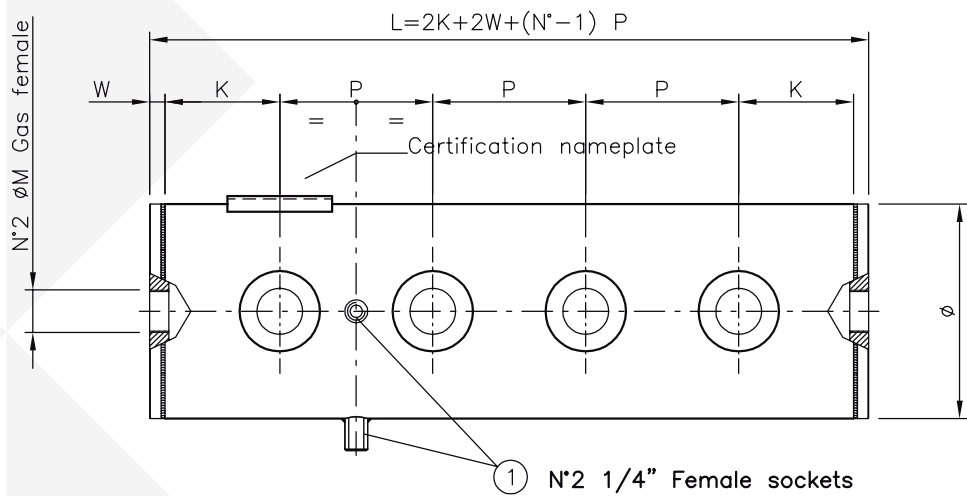
HEADER MATERIAL CALCULATION STANDARD WALL	CARBON STEEL ASME 6.35 MM	CARBON STEEL ASME 7.14 MM	STAINLESS STEEL ASME/PED AT TEMPERATURE DESIGN 70°C 4.57 MM
400 kPa	203 mm/8"	203 mm/8"	203 mm/8"
500 kPa	203 mm/8"	203 mm/8"	214 mm/8.4"
600 kPa	210 mm/8.3"	205 mm/8.1"	227 mm/8.9"
700 kPa	215 mm/8.5"	210 mm/8.3"	240 mm/9.4"
800 kPa	225 mm/8.9"	215 mm/8.5"	257 mm/10"
860 kPa	230 mm/9.1"	220 mm/8.7"	268 mm/11"

MECAIR - 12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

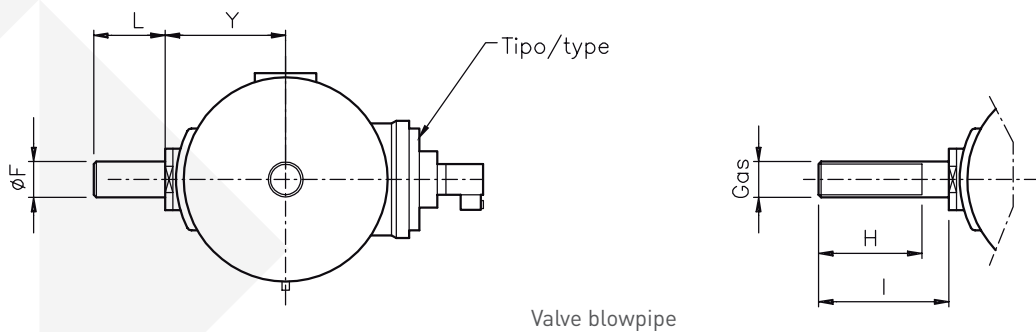
PRODUCT LEAFLET

TANK DIMENSIONS



						TO BE COMPLETED BY CUSTOMER		
$\varnothing$ TANK	$\varnothing$ VALVE	P MIN.	K MIN.	W	$\varnothing M$	P DISTANCE REQUIRED	N NUMBER OF VALVES	K OPTIONAL
DN12"	2.5"	205 mm*/8.1"	130 mm/5.1"	25 mm/0.98"	2"			

* Refer to 12" Nominal Pitches table above.



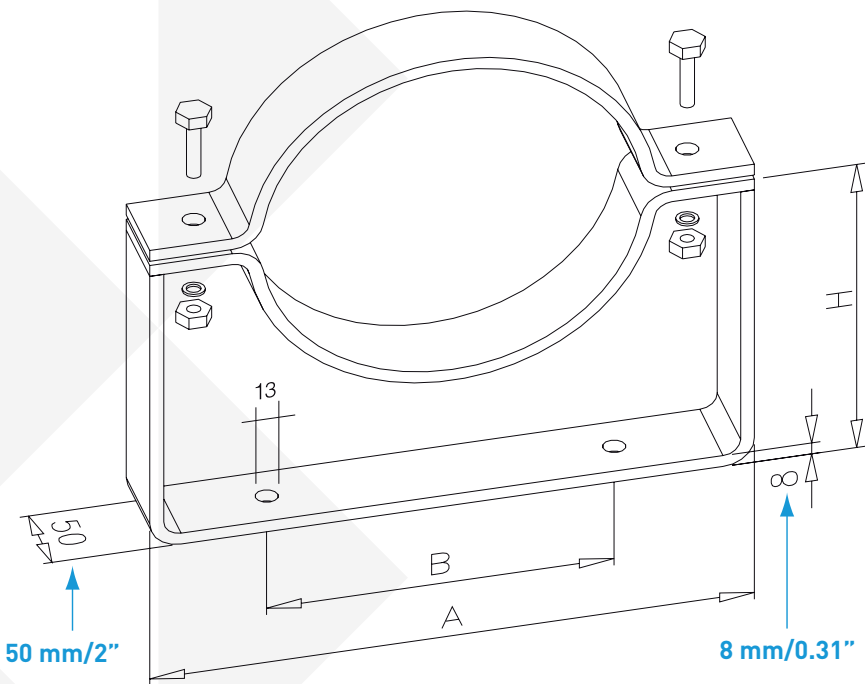
$\varnothing$ TANK	$\varnothing F$	Y	SHORT UNTHREADED	L	LONG UNTHREADED	L	SHORT THREADED	$\varnothing G$ GAS	H	I
DN12"	88.9	187 mm/7.4"	TS520	80 mm/3.1"	TL520	140 mm/5.5"	TF520	2.5"	130 mm/5.1"	140 mm/5.5"

MECAIR - 12" TANKS WITH 2½" AND 3" VALVES

HEADER TANK SOLUTIONS

PRODUCT LEAFLET

BRACKET DIMENSIONS



DN TANK	TYPE OF BRACKET	A	B	H
12" [323.9]	TH12	490 mm/19"	300 mm/12"	340 mm/13"
	TM12	490 mm/19"	300 mm/12"	288 mm/11"
	TB12	490 mm/19"	300 mm/12"	234 mm/9.2"



MECAIR SRL

VIA BERTACCIOLA, 50, 20813 BOVISIO MASCIAGO (MB), ITALY WWW.GOYENMECAIR.PENTAIR.COM

Note: The information and data contained in this document are based on our general experience and are believed to be correct. They are given in good faith and are intended to provide a guideline for the selection and use of our products. Since the conditions under which our products may be used are beyond our control, this information does not imply any guarantee of final product performance and we cannot accept any liability with respect to the use of our products. The quality of our products is guaranteed under our conditions of sale. Existing industrial property rights must be observed.

PL PENTAIR MECAIR HEADER TANK SOLUTIONS 12in T 2.5 + 3in V 3517 © 2017 Pentair. All Rights Reserved.