



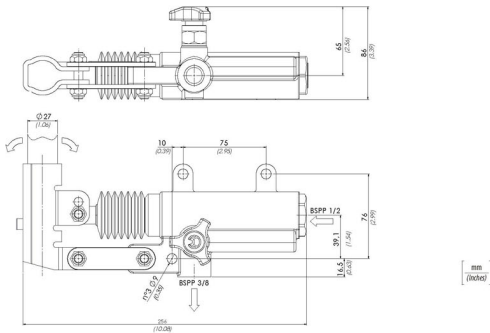
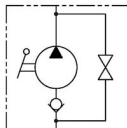
02

PM20

01	Pompa a mano semplice effetto <i>(Double pumping hand pump for single acting cylinder)</i>		PM20
02	Optional	Con soffietto <i>(With rubber protection)</i>	P
		Senza rubinetto di scarico con valvola di massima <i>(Without unloading valve With relief valves)</i>	WRV
		Senza rubinetto di scarico <i>(Without unloading valve)</i>	W
		Con joystick <i>(With joystick)</i>	J
		Con leva di scarico Ø 27 mm <i>(With unloading lever Ø 1.06 inch)</i>	L
		con rubinetto di scarico e valvola di massima <i>(With drain valve and relief valve)</i>	RRV

The pump is supplied with acting lever 23.6 inch long

Schema idraulico - Hydraulic circuit



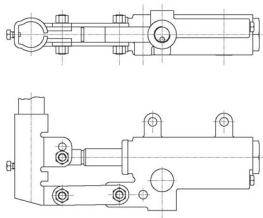
Dati tecnici - Technical data

Olio idraulico/Hydraulic oil	ISO 6743/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm²/s (15 to 250 cSt)
Classe di contaminazione max con filtro Max contamination index with filter	ISO 4406:1999 Classe 19/17/14
Temperatura dell'olio/Oil temperature	-20°C +80°C -℥F
Temperatura ambiente/Ambient temperature	-20°C +50°C -℥F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata) It is necessary a filter use to protect the valve (advised filtration 15 µm)	

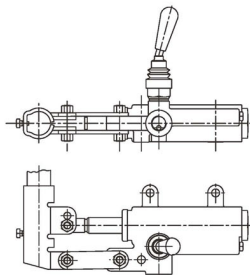
Caratteristiche tecniche - Technical characteristics

Tipo Type	Cilindrata (cm ³) Displacement (in ³)	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PM20	20 (1.22)	150 (2175)	350 (5075)	3,4 (7.5)

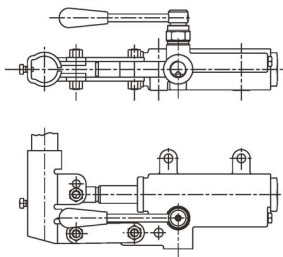
W



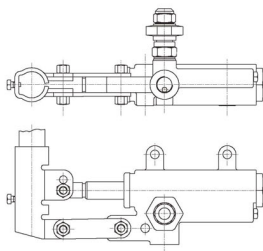
J



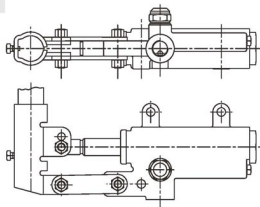
L



RRV



WRV

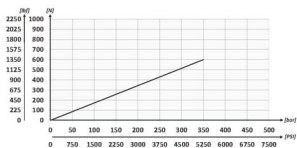


Valvola di massima
(Relief valve)

Molla 40/250 bar
Spring 580/507.5 PSI

Taratura Standard 100 bar
(Standard Setting) 1500 psi

Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever





La pompa viene fornita con leva di azionamento L=600 mm
The pump is supplied with acting lever 23.6 inch long

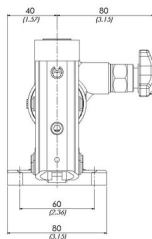
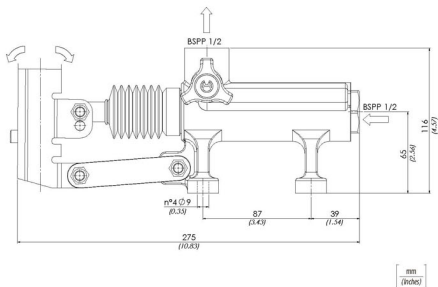
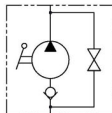
Codice ordinazione Ordering code

01 02

PM50

01	Pompa a mano doppio pompaggio per cilindro a semplice effetto (Double pumping for single acting cylinder)	PM50
	Con soffiello (With rubber protection)	P
	Senza rubinetto di scarico con valvola di massima (Without unloading valve With relief valves)	WRV
	Senza rubinetto di scarico (Without unloading valve)	W
02	Optional	
	Con joystick (With joystick)	J
	Con leva di scarico Ø 27 mm (With unloading lever Ø 1.06 inch)	L
	Con rubinetto di scarico e valvola di massima (With unloading and relief valves)	RRV

Schema idraulico - Hydraulic circuit



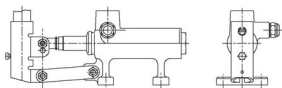
Dati tecnici - Technical data

Olio idraulico/Hydraulic oil	ISO 6743/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm ² /s (15 to 250 cSt)
Classe di contaminazione max con filtro Max contamination index with filter	ISO 4406:1999 Classe 19/17/14
Temperatura dell'olio/Oil temperature	-20°C +80°C -4°F +176°F
Temperatura ambiente/Ambient temperature	-20°C +50°C -4°F +122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm) It is necessary a filter use to protect the valve (advised filtration 15 µm)	

Caratteristiche tecniche - Technical characteristics

Tipo Type	Cilindrata (cm ³) Displacement (in ³)	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PM50	50 (3.05)	80 (1160)	280 (4060)	4,2 (9.25)

WRV

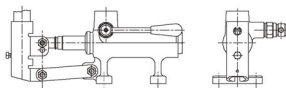


Valvola di massima
(Relief valve)

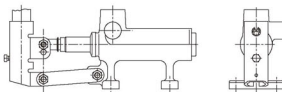
Molla 40/350 bar
Spring 580/5073 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

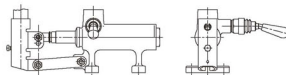
L



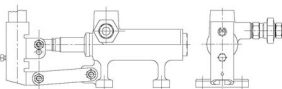
W



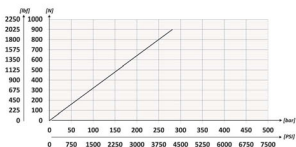
J



RRV



Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever





La pompa viene fornita con leva di azionamento L=600 mm
The pump is supplied with acting lever 23.6 inch long

Codice ordinazione
Ordering code

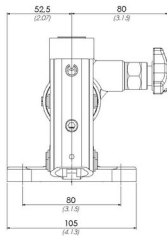
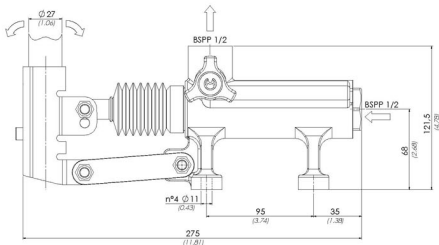
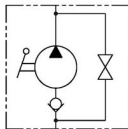
01

02

PM70

01	Pompa a mano doppio pompaggio per cilindro a semplice effetto (Double pumping hand pump for single acting cylinder)	PM70
	Con soffiello (With rubber protection)	P
	Senza rubinetto di scarico con valvola di massima (Without unloading valve With relief valves)	WRV
	Senza rubinetto di scarico (Without unloading valve)	W
02	Optional	
	Con joystick (With joystick)	J
	Con leva di scarico Ø 27 mm (With unloading lever Ø 1.06 inch)	L
	Con rubinetto di scarico e valvola di massima (With unloading and relief valves)	RRV

Schema idraulico - Hydraulic circuit



[mm
(inches)]

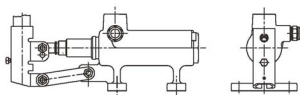
Dati tecnici - Technical data

Olio idraulico/Mineral oil	ISO 6743/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm ² /s (15 to 250 cSt)
Classe di contaminazione max con filtro Max contamination index with filter	ISO 4406:1999 Classe 19/17/14
Temperatura dell'olio/Oil temperature	-20°C +80°C -4°F +176°F
Temperatura ambiente/Ambient temperature	-20°C +50°C -4°F +122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm) It is necessary a filter use to protect the valve (advised filtration 15 µm)	

Caratteristiche tecniche - Technical characteristics

Tipo Type	Cilindrata (cm ³) Displacement (in ³)	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PM70	70 (4.27)	50 (725)	200 (2900)	5,6 (12.34)

WRV

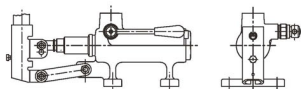


Valvola di massima
(Relief valve)

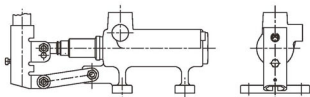
Molla 40/350 bar
Spring 580/5073 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

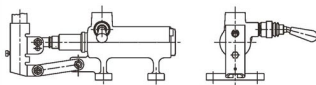
L



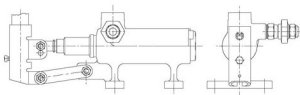
W



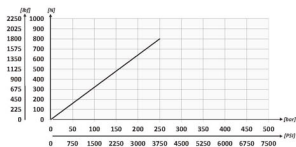
J

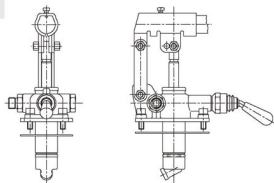
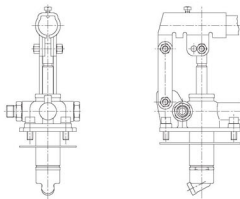
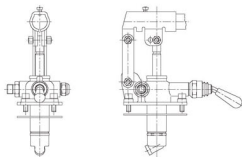


RRV



Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever

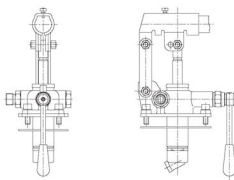
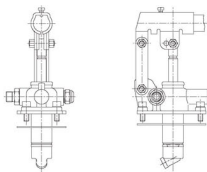


J**W****JRV**

Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

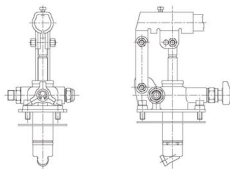
Taratura Standard 100 bar
(Standard Setting) 1450 PSI

L**WRV**

Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

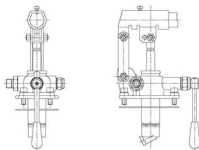
Taratura Standard 100 bar
(Standard Setting) 1450 PSI

RV

Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

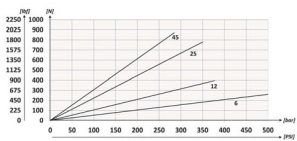
LRV

Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

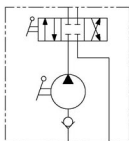
Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever





La pompa viene fornita con guarnizione sagomata
+ viti di fissaggio + leva di azionamento L=600 mm
*The pump is supplied with shaped seal, fixing screws
and acting lever 23.6 inch long*

Schema idraulico - Hydraulic circuit



Codice ordinazione Ordering code

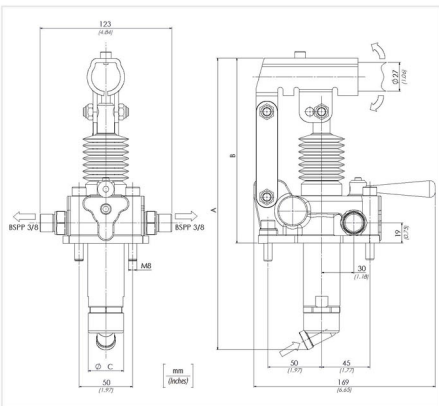
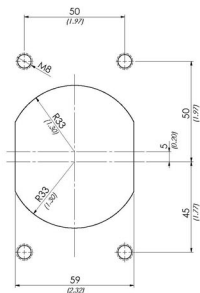
01 02 03

PMI

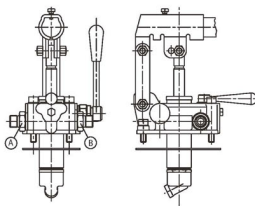
01	PMI			
01	Pompa a mano doppio pompaggio per cilindro a doppio effetto - centro chiuso (Double pumping hand pump for double acting cylinder - closed center)			
	Cilindrata (Displacement)	A	B	C
	6 cm ³ (0.37 in ³)	253 (9.96)	166 (6.54)	34 (1.34)
	12 cm ³ (0.73 in ³)	253 (9.96)	166 (6.54)	34 (1.34)
02	25 cm ³ (1.53 in ³)	273 (10.75)	172 (6.77)	34 (1.34)
	45 cm ³ (2.75 in ³)	283 (11.14)	172 (6.77)	40 (1.57)
03	Optional	Con soffietto (With rubber protection)		P
		Con leva di scarico Ø 27 mm (With unloading lever Ø 1.06 inch)		L
		Con valvola di massima pressione (With relief valves)		RV
		Con leva di scarico e valvola di massima pressione (With unloading lever and relief valves)		LRV

Dati tecnici - Technical data

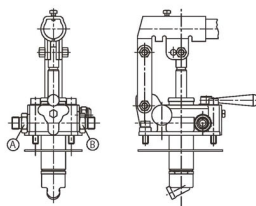
Olio idraulico/Mineral oil	ISO 6743/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm ² /s (15 to 250 cSt)
Classe di contaminazione max con filtro Max contamination index with filter	ISO 4406:1999 Classe 19/17/14
Temperatura dell'olio/Oil temperature	-20°C +80°C -4°F +176°F
Temperatura ambiente/Ambient temperature	-20°C +50°C -4°F +122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm) It is necessary a filter use to protect the valve (advised filtration 15 µm)	



L



RV

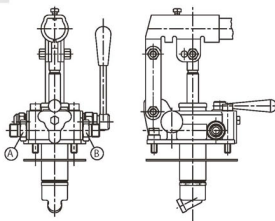


Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

LRV

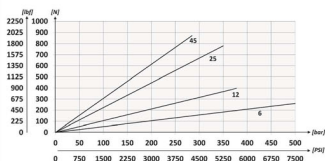


Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever



Caratteristiche tecniche - Technical characteristics

Tipo Type	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PMI6	420 (6090)	500 (7250)	4,20 (9.25)
PMI12	220 (3190)	380 (5510)	
PMI25	120 (1740)	350 (5075)	
PMI45	80 (1160)	280 (4060)	



La pompa viene fornita con guarnizione sagomata
+ viti di fissaggio + leva di azionamento Ø 27 mm L=600 mm

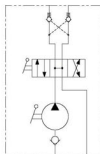
The pump is supplied with shaped seal, fixing screws
and acting lever Ø 27 inch 23 inch long

Codice ordinazione
Ordering code

01	02	03
PMT		

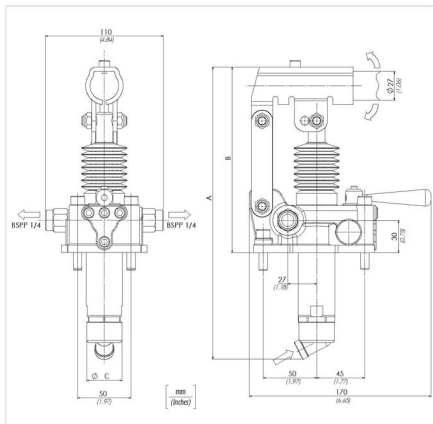
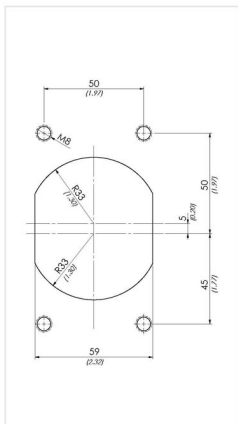
01	Pompa a mano doppio pompaggio per cilindro a doppio effetto con valvole di blocco (Double pumping hand pump with check valves for double acting cylinder)				PMT
02	Cilindrata (Displacement)	A	B	C	
	6 cm ³ (0.37 in ³)	253 (9.96)	166 (6.54)	34 (1.34)	6
	12 cm ³ (0.73 in ³)	253 (9.96)	166 (6.54)	34 (1.34)	12
	25 cm ³ (1.53 in ³)	273 (10.75)	172 (6.77)	34 (1.34)	25
	45 cm ³ (2.75 in ³)	283 (11.14)	172 (6.77)	40 (1.57)	45
03	Optional	Con soffiello (With rubber protection)			P
		Con valvola di massima pressione su A e B (With relief valves on A and B)			RVAB
		Con valvola di massima pressione su B (With relief valves on B)			RVB

Schema idraulico - Hydraulic circuit

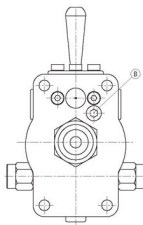


Dati tecnici - Technical data

Olio idraulico/Mineral oil	ISO 6743/4 (DIN 5152-4)		
Viscosità olio/Oil viscosity	15-250 mm²/s (15 to 250 cSt)		
Classe di contaminazione max con filtro	ISO 4406:1999 Classe 19/17/14		
Max contamination index with filter			
Temperatura dell'olio/Oil temperature	-20°C +80°C	-4°F +176°F	
Temperatura ambiente/Ambient temperature	-20°C +50°C	-4°F +122°F	
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm)			
It is necessary a filter use to protect the valve (advised filtration 15 µm)			

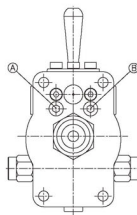


RVB



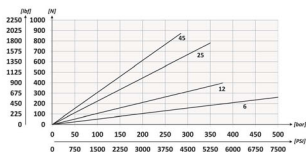
Valvola di massima
(Relief valve) Molla 40/350 bar
Spring 580/5075 PSI Taratura Standard 100 bar
(Standard Setting) 1450 PSI

RVAB



Valvola di massima
(Relief valve) Molla 40/350 bar
Spring 580/5075 PSI Taratura Standard 100 bar
(Standard Setting) 1450 PSI

Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever



Caratteristiche tecniche - Technical characteristics

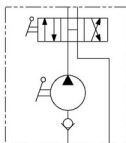
Tipo Type	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PMT6	420 (6090)	500 (7250)	4,20 (9.25)
PMT12	220 (3190)	380 (5510)	
PMT25	120 (1740)	350 (5075)	
PMT45	80 (1160)	280 (4060)	



La pompa viene fornita con guarnizione sagomata
+ viti di fissaggio + leva di azionamento L=600 mm

The pump is supplied with shaped seal,
and fixing screws and acting lever 23.6 inch long

Schema idraulico - Hydraulic circuit



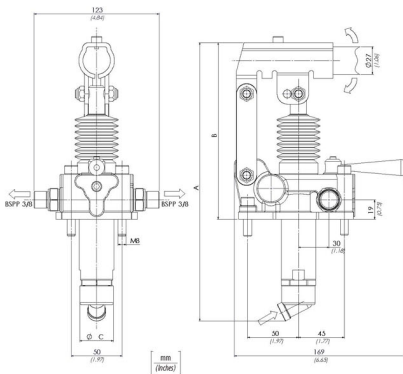
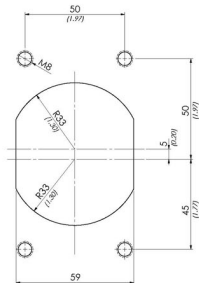
Codice ordinazione Ordering code

01	02	03
PMA		

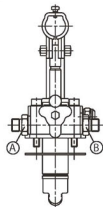
01	Pompa a mano doppio pompaggio per cilindro a doppio effetto - centro aperto (Double pumping hand pump for double acting cylinder - open center)				PMA
	(Cilindrata (Displacement))	A	B	C	
02	6 cm ³ (0.37 in ³)	253 (9.96)	166 (6.54)	34 (1.34)	6
	12 cm ³ (0.73 in ³)	253 (9.96)	166 (6.54)	34 (1.34)	12
	25 cm ³ (1.53 in ³)	273 (10.75)	172 (6.77)	34 (1.34)	25
	45 cm ³ (2.75 in ³)	283 (11.14)	172 (6.77)	40 (1.57)	45
03	Optional	Con soffietto (With rubber protection)			P
		Con leva di scarico Ø 22 mm (With unloading lever Ø 1.06 inch)			L
		Con valvola di massima pressione su A e B (With relief valves on A and B)			RV
		Con leva di scarico e valvola di massima pressione (With unloading lever and relief valves)			LRV

Dati tecnici - Technical data

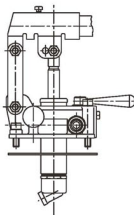
olio idraulico/Mineral oil	ISO 6743/4 (DIN 51524)	
Viscosità olio/Oil viscosity	15-250 mm ² /s (15 to 250 cSt)	
Classe di contaminazione max con filtro Max contamination index with filter	ISO 4406:1999 Classe 19/17/14	
Temperatura dell'olio/Oil temperature	-20°C +80°C	-4°F + 176°F
Temperatura ambiente/Ambient temperature	-20°C +50°C	-4°F + 122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm) It is necessary a filter use to protect the valve (advised filtration 15 µm)		



RV



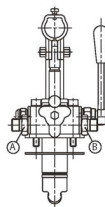
Valvola di massima
(Relief valve)



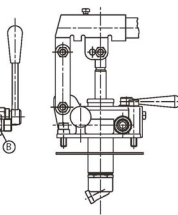
Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

LRV



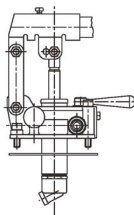
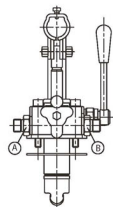
Valvola di massima
(Relief valve)



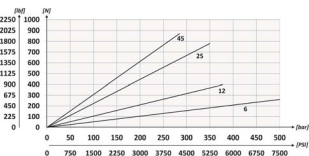
Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

L



Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever



Caratteristiche tecniche - Technical characteristics

Tipo Type	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PMA6	420 (6090)	500 (7250)	4,20 (9.25)
PMA12	220 (3190)	380 (5510)	
PMA25	120 (1740)	350 (5075)	
PMA45	80 (1160)	280 (4060)	



La pompa viene fornita con guarnizione sagomata
+ viti di fissaggio + leva di azionamento Ø 20 mm L=500 mm

La mandata la si ottiene solamente azionando la leva verso il basso
The pump is supplied with shaped seal, fixing screws and acting lever Ø 20 mm L=500 mm
17,7 inch long. Oil flow lever action downwards only

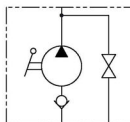
Codice ordinazione Ordering code

01 02 03

PME1

01	Pompa a mano singolo pompaggio verso il basso per cilindro a semplice effetto (Single downward pumping hand pump for single acting cylinder)		PME1
02	Cilindrata (Displacement)	8 cm ³ (0.49 in ³)	8
		15 cm ³ (0.92 in ³)	15
03	Optional	Con soffietto (With rubber protection)	P
		Senza rubinetto di scarico con valvola di massima (Without unloading valve With relief valves)	WRV
		Senza rubinetto di scarico (Without unloading valve)	W
		Con valvola di massima pressione (With relief valves)	RV

Schema idraulico - Hydraulic circuit

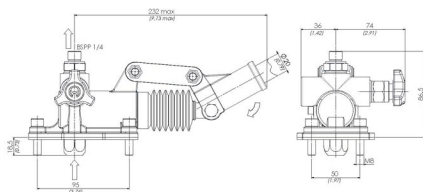
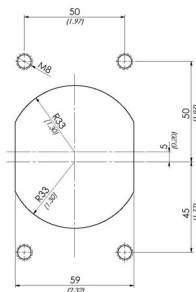


Caratteristiche tecniche - Technical characteristics

Tipo Type	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PME18	180 (2610)	380 (5510)	2,9 (6.39)
PME115	110 (1595)	350 (5075)	

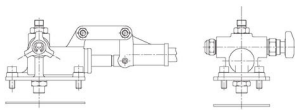
Dati tecnici - Technical data

Olio idraulico/Mineral oil	ISO 6743/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm²/s (15 to 250 cSt)
Classe di contaminazione max con filtro	ISO 4406:1999 Classe 19/17/14
Max contamination index with filter	
Temperatura dell'olio/Oil temperature	-20°C +80°C -4°F +176°F
Temperatura ambiente/Ambient temperature	-20°C +50°C -4°F +122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm) It is necessary a filter use to protect the valve (advised filtration 15 µm)	

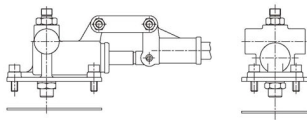


[mm
[inches]

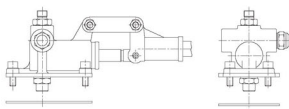
RW



W



WRV

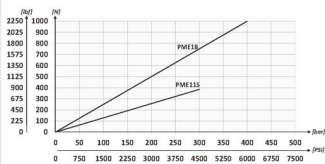


Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5073 PSI

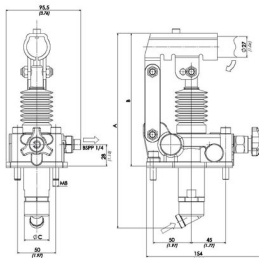
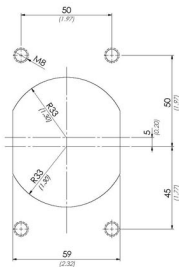
Taratura Standard 100 bar
(Standard Setting) 1450 PSI

Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever





The pump is supplied with shaped seal, fixing screws and acting lever 17.5 inch long.
Oil flow lever action downwards only

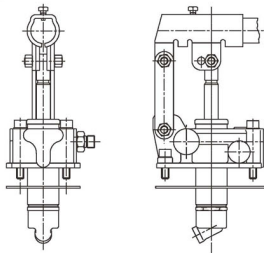


Caratteristiche tecniche - Technical characteristics

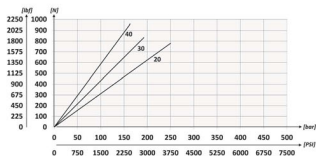
Olio idraulico/Mineral oil	ISO 68/43/4 (DIN 51524)
Viscosità olio/Oil viscosity	15-250 mm²/s (15 to 250 cSt)
Classe di contaminazione max con filtro	ISO 4406: 1999 Classe 19/17/14
<i>Max contamination index with filter</i>	
Temperatura dell'olio/Oil temperature	-20°C + 180°C -4°F + 176°F
Temperatura ambiente/Ambient temperature	-20°C + 50°C -4°F + 122°F
È indispensabile l'utilizzo di un filtro per proteggere la valvola (filtrazione consigliata 15 µm)	
<i>It is necessary a filter use to protect the valve (advised filtration 15 µm)</i>	

Tip type	Pressione ottimale (bar) Optimal pressure (PSI)	Pressione max (bar) Max pressure (PSI)	Peso approssimativo (kg) Approx weight (lb)
PME220	80 (1160)	240 (3480)	4,2 (9,2)
PME230	60 (870)	185 (2683)	
PME240	40 (580)	160 (2320)	

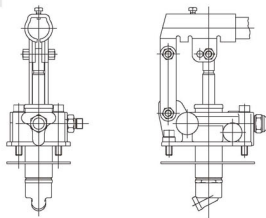
W



Sforzo esercitato all'estremità della leva - Effort operating at the end of the lever



WRV

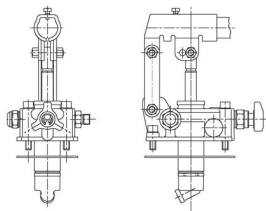


Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

RV

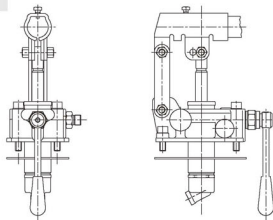


Valvola di massima
(Relief valve)

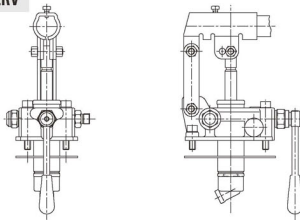
Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI

L



LRV



Valvola di massima
(Relief valve)

Molla 40/350 bar
Spring 580/5075 PSI

Taratura Standard 100 bar
(Standard Setting) 1450 PSI