



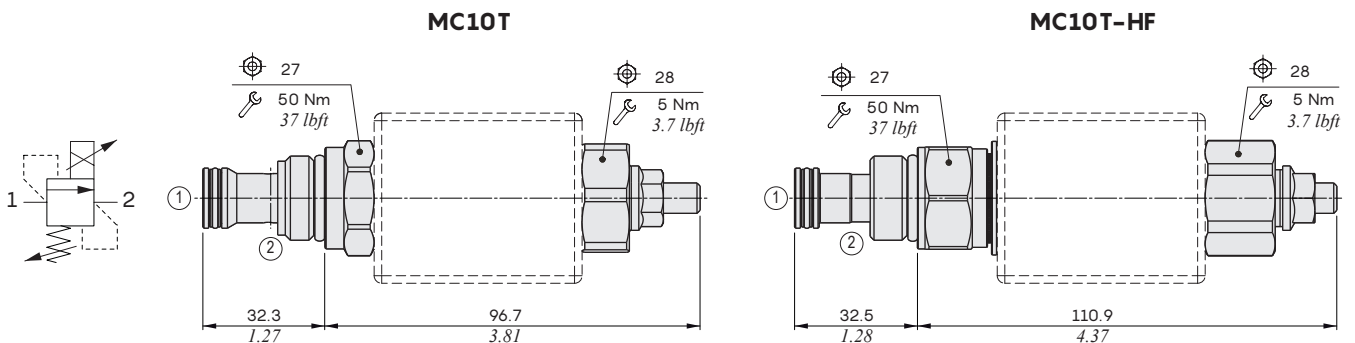
MC10T - MC10T-HF type pressure relief valves - 2 way

- Solenoid proportional type, direct acting
- Poppet type
- Decreasing pressure with increasing current (N.C)
- System of purging of air
- Applications for low flow rates (max. 10 l/min - 2.64 US gpm)

Technical specifications and diagrams are measured with mineral oil of 46 cSt viscosity at 40°C (104°F) temperature.

MC10T		MC10T-HF
Max. flow	3 l/min (0.79 US gpm)	10 l/min (2.64 US gpm)
Max. pressure	350 bar (5100 psi)	250 bar (3600 psi)
Oil leakage	at 80% of max. pressure setting	
	0.25 cm ³ /min (0.015 in ³ /min)	0.50 cm ³ /min (0.030 in ³ /min)
Fluid	mineral based or synthetic hydraulic fluid with lubricating properties	
Viscosity	10-200 cSt	
Max level of contamination	18/16/13 ISO4406	
Fluid temperature	with NBR seals+Polyurethane with FPM seals	from -25°C (-13°F) to 90°C (194°F) from -20°C (-4°F) to 110°C (230°F)
Environmental temp. for working conditions	from -20°C (-4°F) to 60°C (140°F)	
Cavity	SAE 10/2	
Coil type*	BH or BQP19	BQP19
Nominal voltages	12VDC - 24VDC	
Power rating	33 W (BH) - 15 W (BQP19)	15 W
Max. control current	12V->1.70 A - 24V->0.85 (BH) 12V->1.25 A - 24V->0.63 A (BQP19)	12V->1.25 A - 24V->0.63 A
Dither frequency	150 Hz	
Hysteresis	<5%	
Weight	0.54 kg (1.19 lb)	0.87 kg (1.91 lb)

NOTE - For different conditions, please contact Walvoil Sales Dpt. - *For coils further features see from page 201.

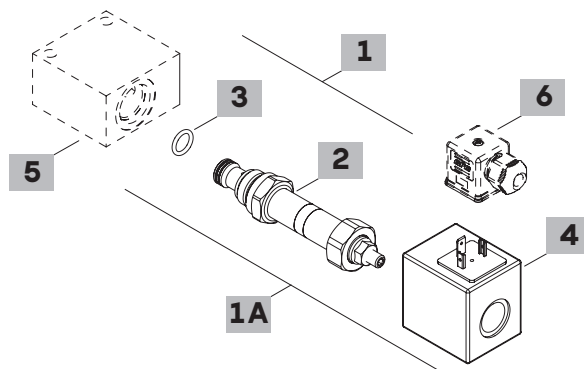


Ordering codes and description composition

MC10T/001B



MC10T/031B



1 Cartridges

TYPE	CODE	DESCRIPTION
MC10T/001B	OMC10002047	Pressure range 1
MC10T/002B	OMC10002048	Pressure range 2
MC10T/003B	OMC10002049	Pressure range 3

1A Complete cartridges with coil

TYPE	CODE	DESCRIPTION
MC10T/031B	OMC10002019	Pressure range 1 , 12VDC
MC10T/032B	OMC10002020	Pressure range 2 , 12VDC
MC10T/033B	OMC10002021	Pressure range 3 , 12VDC
MC10T-HF/033B	OMC10002070	Pressure range 3 , 12VDC

2 Pressure range

TYPE	DESCRIPTION
MC10T	
1	Pressure range 15÷130 bar (217÷1885 psi);
2	Pressure range 15÷170 bar (217÷2465 psi);
3	Pressure range 15÷210 bar (217÷3045 psi);
MC10T-HF	
3	Pressure range 20÷225 bar (290÷3260 psi);

Note: for further pressure range contact Sales Dept

3 Seals

TYPE	DESCRIPTION
B	NBR (Buna)+Polyurethane o-ring seals, std configuration
V	FPM (Viton) o-ring seals, contact Sales Dept

4 Coils

TYPE	CODE	DESCRIPTION
2) BH 12VDC	4SLD001200A	12VDC-ISO4400 coil
3) BQP19 12VDC	4SL5000126A	12VDC-ISO4400 coil
4) BH 24VDC	4SLD002400A	24VDC-ISO4400 coil
5) BQP19 24VDC	4SL5000245A	24VDC-ISO4400 coil

Note: for HF version use only BQP19 coil
For complete coils list see from page 201

5 Valve body

TYPE	CODE	DESCRIPTION
SAE10/2-G 3/8	3CC1020C11	Aluminium body for cavity 10 valve, G 3/8 std thread

Note: aluminium body can stand up to 210 bar (3050 psi)
For steel bodies or different threading see from page 208

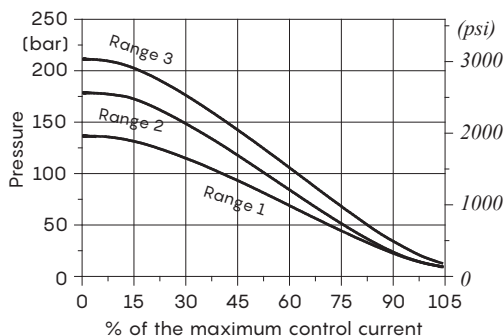
6 Connector

TYPE	CODE	DESCRIPTION
ISO4400	4CN1009995B	Connector

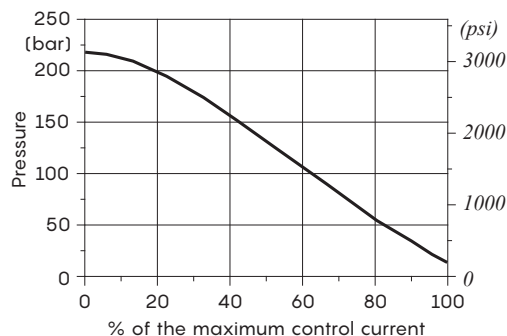
For complete connectors list see from page 201

Rating diagrams

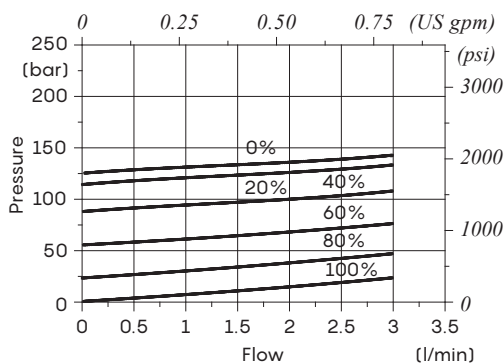
MC10T pressure setting vs. % max. control current
at 1 l/min (0.26 US gpm)



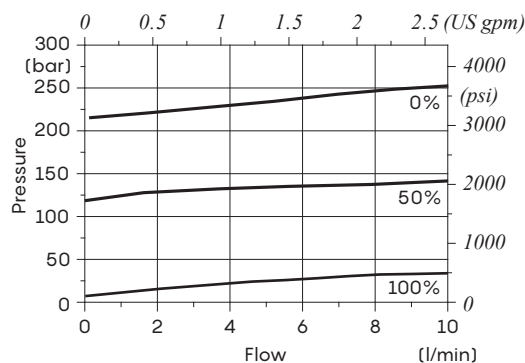
MC10T-HF pressure setting vs. % max. control current
at 2 l/min (0.53 US gpm)



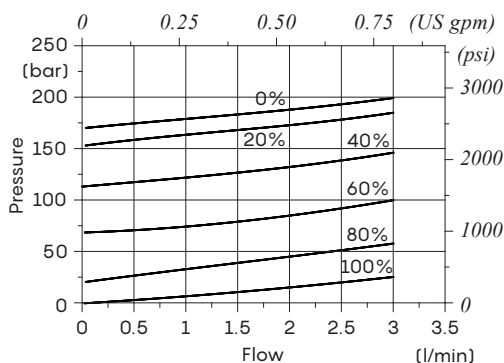
MC10T pressure vs. flow 1->2
for % of control current - Pressure range 1



MC10T-HF pressure vs. flow 1->2
for % of control current



MC10T pressure vs. flow 1->2
for % of control current - Pressure range 2



MC10T pressure vs. flow 1->2
for % of control current - Pressure range 3

