# LMP 902 - 903

### Filter element in according to DIN 24550



Maximum pressure 25 bar Flow rates to 3000 l/min

#### Filter housing (Materials)

- · Head: Anodised Aluminium
- · Housing: Anodised Aluminium
- Manifolds: Welded Phosphated Steel
- · Bypass valve: Steel
- 1000 size filter elements complying with DIN 24550 standard

#### **Pressure**

Working pressure: 25 bar (2.5 MPa)Test pressure: 35 bar (3,5 MPa)

#### **Temperature**

• From -25°C to +110°C

#### **Bypass valve**

- Opening pressure 3.5 bar ±10%
- Other opening pressures on request.

#### **Number of filter elements**

- LMP 902: 4 filter elements CU900
- LMP 903: 6 filter elements CU900

#### **Filter elements**

 Filter element in compliance with DIN 24550 standard Size: 1000

#### ∆p Elements type

- Series N elements: 20 bar
- Oil flow from exterior to interior.

#### Seals

Standard NBR series AOptional FPM series V

#### Weights (kg)

#### Length

LMP902 89.6LMP903 129.2

#### Volumes (dm<sup>3</sup>)

#### Length

LMP902 58LMP903 87

#### Connections

In-Line Inlet-Outlet

#### Compatibility (to ISO 2943)

- Housings compatible with:
   Mineral oils, synthetic fluids,
   aqueous emulsions, water and glycol
- The filter elements are compatible with: Mineral oils, synthetic fluids, aqueous emulsions, water and glycol.
- NBR seals series A, compatible with:
   Mineral oils, synthetic fluids, aqueous emulsions and water and glycol.
- FPM seals series V, compatible with: Synthetic fluids type HS-HFDR-HFDS-HFDU

#### **Filter Element Area**

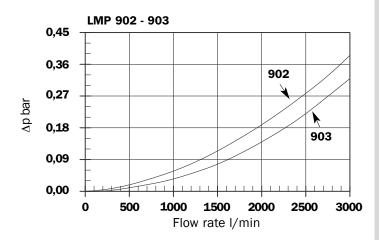
#### Filter element in stainless steel mesh Length

Туре	902	903		
CU 900	52000	78000		
	Values expressed in cm <sup>2</sup>			

#### Filter housing $\Delta p$ pressure drop

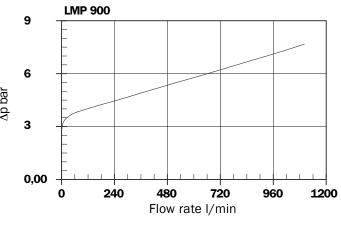
The curves are plotted utilising mineral oil with density of 0.86 kg/dm<sup>3</sup> to ISO 3968.

#### $\Delta$ p varies proportionally with density.



#### **Valves**

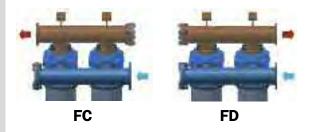
#### Bypass valve pressure drop



#### **Manifolds**

Position of manifolds IN - OUT connections





#### Recommended maximum flow rate

Recommended maximum flow rate for filters installed on lubrication lines, return or in-line filters is defined by the maximum oil velocity in the connections. For filters mounted on Off-Line lines the maximum recommended flow rate is defined by the pressure drop of the filter element.

Filter for pressurised lubrication, max. oil velocity 2.5 m/sec.
Return or in-line filter, max oil velocity 5 m/sec.

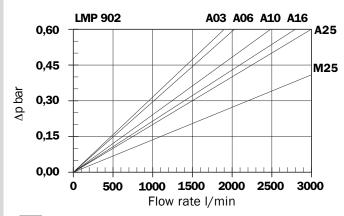
	Connections
Oil velocity	4"
2,5 m/sec.	1200
5 m/sec.	2400

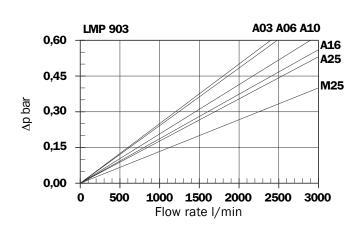
Flow rate I/min

Off-Line filter, filter element recommended maximum pressure drop must be equal to  $\Delta p$  0.2  $\div$  0.3 bar.

#### Recommended maximum flow rate

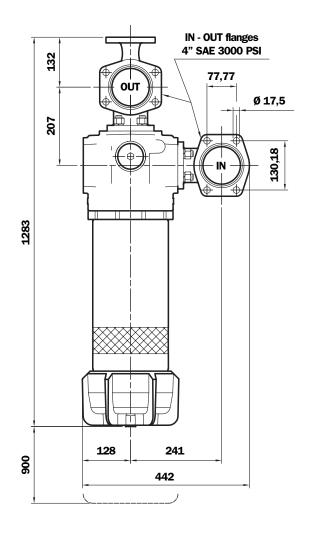
- Pressure drop of filter assembly equal to  $\Delta p$  0.6 bar.
- Oil kinematic viscosity 30 mm<sup>2</sup>/s (cSt).
- Density 0.86 kg/dm<sup>3</sup>.
- Connections of filter under test G 4".



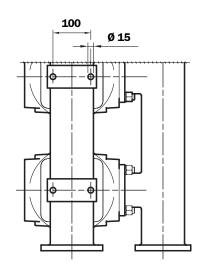


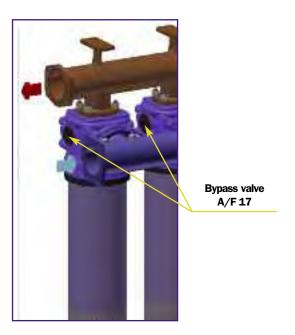
### Dimensions

### LMP 902 - 903



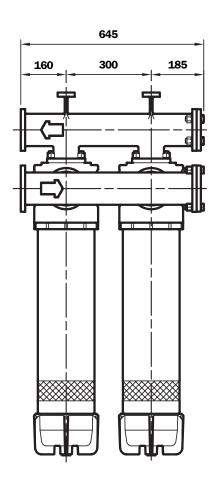


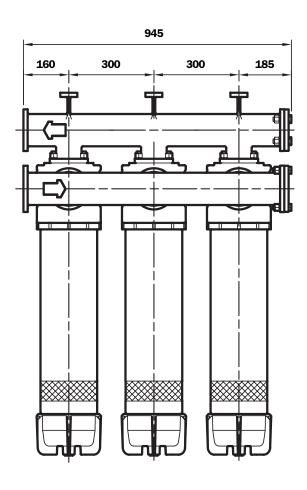




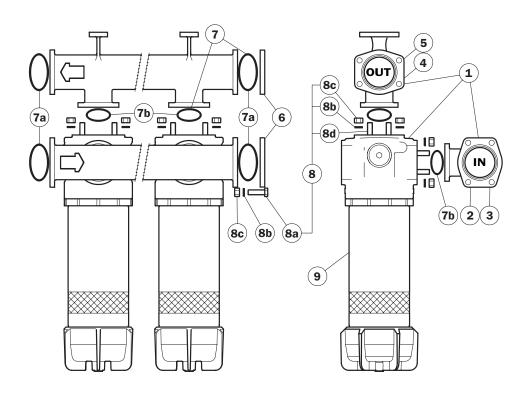
### **LMP 902**

### **LMP 903**





## Spare parts



Item	Description	Q.ty - Ll *2	MP 90* *3	FILTER Series LMP 902 - 903	
1	Filter assembly	1	1	See order table	
2	IN manifold with 2 filter connections	1	-	01039270	
3	IN manifold with 3 filter connections	-	1	01039272	
4	OUT manifold with 2 filter connections	1	-	01039271	
5	OUT manifold with 3 filter connections	-	1	01039273	
6	4" SAE 3000 psi plugged flange	2	2	01042020	
7	Manifolds seal kit	1	1	NBR 020503404	FPM 02050405
7a	IN-OUT O-Ring	4	4	O-R 4437 Ø 110.7 x 3.53	
7b	Manifolds/filter O-Ring	4	6	O-R 4337 Ø 85.32 x 3.53	
8	Threaded fasteners kit	1	1	LMP902 - 02049051 LMP903 - 02049052	
8a	Hexagon bolt screws	8	8	UNI-EN 24017 M16 x 55-10.9	
8b	Spring washers	24	32	UNI 1751 - B16	
8c	Nuts	24	32	UNI-EN 24032-M16-10.9	
8d	Studs	16	24	M16 x 40 - 10.9	
9	Filter	2	3	See order table LMP 9012F1P02 page 71	
-	Filter spare parts Item 9	2	3	See table spare parts LMP 9012F1P02 page 70	
-	Filter seals kit Item 9	2	3	See table spare parts LMP 9012F1P02 page 70	
-	Indicators	1	1	See order table	

### Ordering information LMP 902 - 903

#### 1 2 3 4 5 6 8 Filter assembly LMP 903 2 В FB **Example: LMP A10** P01 Filter element 6 8 **CU900 Example: CU900 A10** Ν **P01** (6 cartridges required) 1 - Style 6 - Filter element **Filter** Filter element A01 Inorganic microfibre\* 1 μ A03 Inorganic microfibre $3 \mu$ 902 900 With 4 cartridges A06 Inorganic microfibre 6 μ Absolute filtration 903 900 With 6 cartridges A10 Inorganic microfibre 10 $\mu$ $6x(c) \ge 1000$ **A16** Inorganic microfibre 16 μ 2 - Filter length A25 Inorganic microfibre 25 µ 2 \* On request 3 - Valve M25 Wire mesh M60 Wire mesh Nominal Filtration S Without by-pass M90 Wire mesh В With bypass With by-pass 7 - Max filter element differential pressure Opening pressure: on request Ν ∆p 20 bar 4 - Filter seals **NBR** Α 8 - Option FPM V P01 MP Filtri standard On request Pxx Customer request 5 - Connections

Туре	LMP 902 - 903
FA	
FB	
FC	See page 74
FD	

DIFFERENTIAL INDICATORS (see page 120)