

# CONSTRUCTION & MATERIAL PROCESSING



PASSION  PERFORM



## EXCEPTIONAL SAFETY AND PERFORMANCE: OUR PRODUCTS MAKE THE DIFFERENCE IN THE CONSTRUCTION!

We are meeting the challenges of the construction industry head on creating robust and innovative products that control contamination; protect machinery from hydraulic failures; and deliver greater reliability, performance and efficiency.

With the vast majority of hydraulic system failures caused by the build-up of contamination, we have developed solutions for our customers that ensure quality, safety and cost savings at every stage of the construction process.

partnership

proven reliability

quality

longer machinery lifespan

worldwide support

MP Filtri has always forged close partnerships with customers thanks to its commitment to meeting their needs and delivering effective solutions. The company offers a wide range of high-performance products including:



Return filters



Return filters



Low pressure filters



High pressure filters



Return / Suction filters



Elixir® filters

SFEX Series  
Suction filters

RFEX Series  
Return filters

LFEX Series  
Low Pressure filters

### KEY PRODUCTS

FMMX Series  
for potentially  
explosive atmosphere

## RELIABILITY AND QUALITY, WHY MP FILTRI IS THE PERFECT PARTNER

State-of-the-art research and development programmes ensure our products are extensively tested and perfected in our cutting-edge laboratory. A passion for innovation drives everything we do.

**Technology and expertise are in the company's DNA**

### THE MAIN FEATURES THAT DISTINGUISH OUR PRODUCTS ARE:

- ◆ A dramatic reduction in unplanned downtime
- ◆ Support from a dedicated team of technical and commercial specialists
- ◆ The latest research and development technologies
- ◆ A dedicated laboratory for customer-specific tests
- ◆ Authorised distributors worldwide
- ◆ A wide range of precise customisation options



## ALL OF OUR FILTERS COMPLY WITH ALL HYDRAULIC SECTOR REGULATIONS

### MULTI-PASS ISO 16889

The ISO Multipass test is to evaluate filtration performance of a filter element.

This standard provides reproducible test methods and data determining filtration efficiency, contamination holding capacity, and differential pressure characteristics. The test can be used on filter media which have a filtration quotient (Beta value) of  $\beta_{25(c)} \geq 75$  and a gravimetric end level in the tank of less than 200 mg/l.

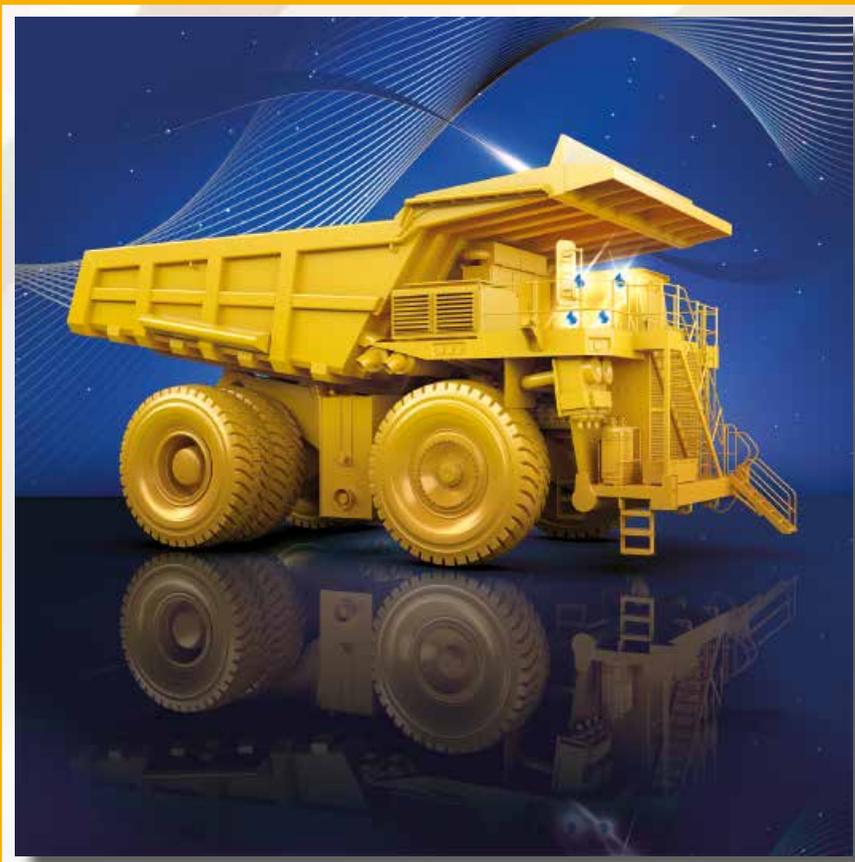
The test is done using a constant supply of a contaminant ISO MTD (Medium Test Dust).

#### Filtration ISO standard Comparison

$\beta_{X(c)} > 1000$ ISO 16889	$\beta_X > 200$ ISO 4572	MP Filtri Filter media code
5 $\mu\text{m}_{(c)}$	3 $\mu\text{m}$	A03
7 $\mu\text{m}_{(c)}$	6 $\mu\text{m}$	A06
10 $\mu\text{m}_{(c)}$	10 $\mu\text{m}$	A10
16 $\mu\text{m}_{(c)}$	18 $\mu\text{m}$	A16
21 $\mu\text{m}_{(c)}$	25 $\mu\text{m}$	A25

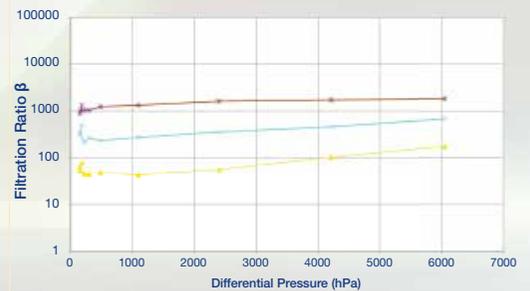
Designed to thrive in even the most challenging working conditions

We maintain full control over every element of production from design to delivery

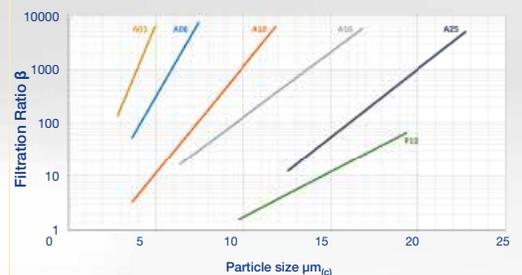


## BETA VALUE STABILITY

FILTRATION RATING A10,  $\beta_{10 \mu\text{m}(c)} > 1000$



## FILTER FINENESS



- ▲  $d > 5 \mu\text{m}_{(c)}$
- ×  $d > 8 \mu\text{m}_{(c)}$
- ✱  $d > 10 \mu\text{m}_{(c)}$

## HYDRAULIC FILTRATION

Designing an effective filtration system requires a precise evaluation of its specific features, including: sensitivity of the individual components, the degree and type of contamination, circuit pressure,

flow rate, environmental conditions, fluid used and intervention cycles delivering longer machinery lifespans and reduced service costs.

### RETURN FILTERS



#### MDH

"Bubble-free" deaeration filter allows the reduction of air inflow into the tank

up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
8	116	750	198
10	145	500	132

#### MPFX



Tank top semi-immersed filter, easy filter element servicing

#### MPTX



Tank top semi-immersed filter with air breather, easy filter element servicing

ELIXIR® enables easier maintenance with only the FEX filter elements needing to be replaced - resulting in a lower environmental impact than other models.

up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
16	232	300	79

### ELIXIR® FILTERS

SFEX SERIES - Suction  
RFEX SERIES - Return  
LFX SERIES - Low pressure



### RETURN / SUCTION FILTERS



#### MRSX

Tank top filter with combined filtration on return and suction to the inlet at the hydrostatic transmissions in closed loop

up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
10	145	300	79

### LOW PRESSURE FILTERS

LMP 110 MULTIPORT  
In-line filter with Multiport design for multiple choice connection



up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
80	1160	175	46

### HIGH PRESSURE FILTERS



#### FMMX

High pressure filter for mobile applications, low flow rate

up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
420	6092	300	79
450	6527	630	166

#### FHP

Typical high pressure filter for mobile applications, high flow rate



### HIGH PRESSURE FILTERS FOR POTENTIALLY EXPLOSIVE ATMOSPHERE

ATEX CERTIFIED PRODUCTS  
Standard ATEX Directive 2014/34/EU and UK Regulation S.I. 2016 No. 1107 (as amended).

up to P <sub>max</sub>		up to Q <sub>max</sub>	
bar	psi	l/min	gpm
420	6092	300	79

#### FMMX

High pressure filter for mobile applications, low flow rate



### FILTER ELEMENTS

WIDE RANGE OF ELEMENT OPTIONS FOR MYCLEAN AND ZEROSPARK® CONCEPT FILTERS

Wide range of filter elements in various filtration grades for all MP Filtri filters and as interchangeable.



THE X CONCEPT FOR OUR FILTERS

zerospark®  
THE ANTI-STATIC FILTERS

THE Z ANTISTATIC CONCEPT FOR OUR FILTERS



## TANK ACCESSORIES

The complete range of tank accessories for hydraulic circuits comprises breather filters, filler and breather filters, filler caps, visual and electrical level indicators, pressure gauges selectors, flanges for fixing the oil tubes on the tank cover and inspection covers.

Filler and breather filters have a dual function at the tank inlet filtering incoming air pre-filtering the fluid through the basket. This prevents the entry of foreign bodies during the filling or refilling operations.

### SUCTION FILTERS

up to $Q_{max}$	
l/min	gpm
875	231

**STR**  
Submerged suction filter, with bypass



### AIR BREATHERS AND FILLER PLUGS



**TAP90**  
Filling caps and air breathers with multiple technical solutions

up to $P_{max}$	
l/min	gpm
550	145



**TAP114**  
Nylon oil filler and air breather filler cap

3000	793
1600	423

**SAP115**  
Filler plug and polyamide air filters



### VISUAL OIL LEVEL INDICATORS

**LVA**  
Available in three sizes, to monitor the fluid in the tank



## POWER TRANSMISSION

### COUPLINGS



Drive couplings provide the means by which power is transmitted from the electric motor to the hydraulic pump. AKG complete couplings are certificated: ATEX 2014/34/EU & U.K. Regulation S.I. 2016 No. 1107 (as amended)



### BELL-HOUSINGS

Bell-Housings are used as connecting elements between IEC electric motors and a wide range of hydraulic pumps available on the international market



## CONTAMINATION CONTROL SOLUTIONS

### CONTAMINATION MONITORING PRODUCTS



**LPA3**  
Portable Laser Particle Analyser

**CML4**  
Compact Portable Contamination Monitor with integrated pump

### IN-LINE CONTAMINATION MONITORS



**ICM 2.0**  
In-Line Contamination Monitor

**ICM 4.0**  
In-Line Contamination Monitor - WiFi technology integrated

### MOBILE FILTRATION UNIT

up to $Q_{max}$	
l/min	gpm
50	13.20



**UFM 051**  
Mobile transfer and filtration units with ICM In-Line Contamination Monitor

MP Filtri designs and manufactures a complete range of contamination control solutions aimed at increasing the life and productivity developed by our hydraulic circuits.

The technology of the Contamination Monitoring Products division allows preventive and predictive maintenance, guaranteeing maximum continuity of operation, a longer life cycle of components and a reduction in service and maintenance costs.

# WORLDWIDE NETWORK

CANADA ♦ CHINA ♦ FRANCE ♦ GERMANY ♦ INDIA ♦ SINGAPORE  
UNITED ARAB EMIRATES ♦ UNITED KINGDOM ♦ USA



PASSION  PERFORM

in   



[mpfiltri.com](http://mpfiltri.com)

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