# **MDB-4F**

## **CENTRAL FILTER SYSTEM WITH FAN**

The MDB-4F is a self-cleaning filter unit with integrated extraction fan. It contains four self-cleaning polyester filter cartridges. Pressure controlled automatic cleaning system, resulting in the particulate dropping into a collection container at the bottom of the unit.

The MDB-4F features a frequency inverter.



# APPLICATIONS

The MDB-4F is intended to be used for the following	
applications:	
<ul> <li>MIG-MAG/GMAW welding</li> </ul>	
• TIG wolding	

- TIG welding
- FCAW welding

• arc-air gouging

stick/MMAW welding

Do **not** use the MDB-4F for the following applications or in the following circumstances:

- aluminium laser cutting
- oil mist

product data sheet

- heavy oil mist in welding fume
- extraction of aggressive fumes and gases (e.g. from acids, from alkaline, from soldering paste containing lithium)
- extraction of hot gases (more than 45°C/113°F continuously)
- grinding aluminum and magnesium
- flame spraying
- extraction of cement, saw dust, wood dust etc.
- sucking cigarettes, cigars, oiled tissues and other
- burning particles, objects and acids
- explosive environments or explosive substances/gases

## SPECIFICATIONS

Physical dimensions and properties					
Material (housing): • steel grade • steel grade no.	electro-zinc coated steel (according to DIN EN 10152) • DC01+ZE • 1.0330				
Colour: • housing • cover plates	• black RAL 9005 • yellow RAL 1004				
Weight (net) incl. filter cartridges	339 kg (747 lbs)				
Fan motor design	IEC				
Filter cartridges					
Туре	CART-D				
Material	polyester fibres				
Shape	cylinder				
Filter surface area	4 x 15 m <sup>2</sup> (4 x 161.5 ft <sup>2</sup> )				
Filter class	• M • MERV 11				

Performance				
Fan type	radial (TEV-585)			
Working range	1600-3750 m <sup>3</sup> /h (950-2200 CFM)			
Available static pressure (after deduction of pressure drop of CART-D and housing)	<ul> <li>1600 Pa at 1600 m<sup>3</sup>/h (6.4 in. WG at 950 CFM)</li> <li>1300 Pa at 2500 m<sup>3</sup>/h (5.2 in. WG at 1475 CFM)</li> <li>800 Pa at 3500 m<sup>3</sup>/h (3.2 in. WG at 2050 CFM)</li> <li>550 Pa at 3750 m<sup>3</sup>/h (2.2 in. WG at 2200 CFM)</li> </ul>			
Electrical data	Electrical data			
Power consumption	2,2 kW (3 HP)			
Connection voltage: • Europe/USA • Canada	• 400-480V/3~/50-60Hz • 600V/3~/60Hz			
Default setting: • Europe • USA • Canada	• 400V • 480V • n/a			
Nominal current: • Europe • USA • Canada	• 8.0 A • 4.6 A • 3.1 A			
Protection class	IP 55 (motor and electronics)			
Ambient conditions	-			
Operating temperature: • min. • nom. • max.	• 5°C (41°F) • 20°C (68°F) • 45°C (113°F)			
Max. relative humidity	75%			
Outdoor use allowed	yes, if protected against rain			
Storage conditions	<ul><li>5-45°C (41-113°F)</li><li>relative humidity max. 75%</li></ul>			
Options and accessories				
SAS-315 straight	duct silencer			
SAS-315 elbow 90°	duct silencer			

outlet transition from square

to round

TOL-315

Where used				
Multiple arm systems (max. 3-4 arms in use simultaneously)				
FlexHood systems				
Order information				
Article number: • 400-480V/3~/50-60Hz • 600V/3~/60Hz	• 0000100835 • 0000100836			
Number/package	1			
Shipping data				
Gross weight (incl. pallet)	425 kg (551 lbs)			
Packing dimensions (L x W x H)	1800 x 1480 x 2320 mm (70.9 x 58.3 x 91.3 in.)			
Harmonized Tariff Code	8421.39.2090			
Country of origin Netherlands				

#### APPROVALS/CERTIFICATES

CE	
c UL us	ref. UL-508A

#### DIMENSIONS



		men			men
А	2098	82.6	J	606	23.9
В	905	35.6	К	905	35.6
С	896	35.3	L	413	16.3
D	413	16.3	М	Ø 315	Ø 12.4
E	Ø 315	Ø 12.4	Ν	500	19.7
F	1024	42.3	0	1679	66.1
G	1250	49.2	Р	235	9.3
Н	1679	66.1	Q	606	23.9
Ι	135	5.3	R	785	30.9

### FEATURES



Product type Article no. Product category Version MDB-4F refer to order information central filter systems 041213/I

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