

DRYPOINT® M FDR

FDR Series Membrane Air Dryers

Features and Benefits

TWIST 45 TECHNOLOGY:

highest possible performance
from a membrane with 45° wound fiber

LOW MAINTENANCE

with no moving parts or electrical components
trouble-free operation is achieved
even in mobile applications

COMPACT DESIGN

the small footprint combined with the variety
of configurations possible make an
ideal choice for all types of applications



How it Works

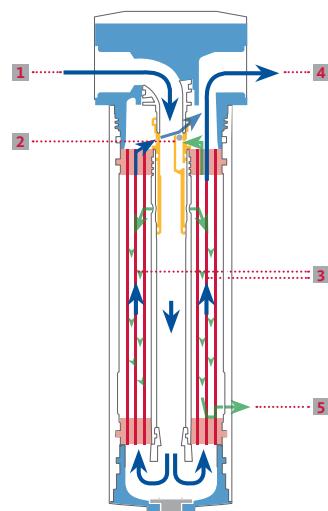
1 The compressed air flows into the center tube at the core of the membrane dryer.

2 The purge air required for drying is continuously diverted at the outlet zone of the membrane element and is atmospherically expanded through a defined nozzle opening. This purge air is significantly drier due to the expansion process, as the humidity contained in the compressed air is now increased to a larger volume. The dry purge air then passes over the outside of the membrane fibers.

3 Two air flows with different moisture contents move in a countercurrent through the membrane element, and are only separated by the membrane wall. The humid compressed air flows inside the hollow-fibers of the membrane, and the dry purge air flows outside. As a result of the different moisture contents, the humidity diffuses from the compressed air into the purge air. The drying process is highly efficient thanks to the tightly controlled and specific method of winding the membrane fibers, the TWIST 45 technology.

4 The dry compressed air leaves the membrane dryer as flows downstream.

5 The humid purge air is released into the environment.



Technical Details

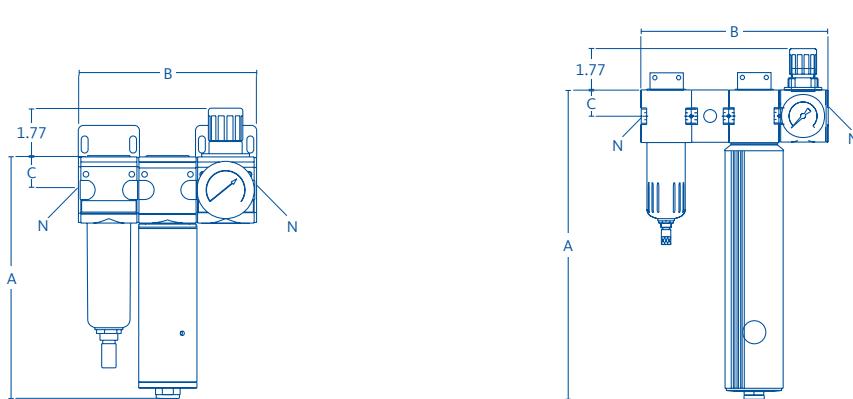
DRYPOINT® M FDR

Membrane Dryer Packages with Pre-filter and Pressure Regulator

Micro-Filter	
Medium	Compressed Air
Connection Size	1/4" NPT
Drain Type	Automatic Float
Filtration Grade	0.01 µm
Particle Separation	0.01 µm
Residual Oil Content	0.01 mg/m ³
Operating Pressure	21 to 232 psig
Temperature range	32°F to 140°F

Membrane Dryer	
Medium	Compressed Air
Connection Size	1/4" NPT
Differential Pressure	1.45 to 4.35 psid
Max. Standard Operating Conditions	140°F @ 100 psig
Max. Optional Operating Conditions	120°F @ 180 psig
Minimum Ambient Air Temperature	34°F

Regulator	
Medium	Compressed Air
Connection Size	1/4" NPT
Max. Supply Pressure	232 psig
Temperature range	32°F to 140°F



Filter + membrane dryer + pressure regulator
(with pressure scale 44–145 psig) + wall bracket

Filter + membrane dryer + pressure regulator
(with pressure scale 44–145 psig) + wall bracket

DRYPOINT® M	DFDR08 N19KA	DFDR08 N24KA	DFDR08 N28KA	DFDR08 N34KA	DFDR10 N34KA	DFDR10 N41KA	DFDR10 N47KA
Connection Size (NPT)	1/4"	1/4"	1/4"	1/4"	1/4"	1/4"	1/4"
Flow Rate (scfm)	1.83	3.66	5.49	7.32	9.80	11.00	14.60
Dimension data							
A (inches)	7.48	9.44	11.02	13.38	13.38	16.14	18.50
B (inches)	5.51	5.51	5.51	5.51	6.88	6.88	6.88
C (inches)	1.06	1.06	1.06	1.06	1.06	1.06	1.06
Weight (lbs)	2.97	3.15	3.30	3.50	6.39	6.83	7.27



BEKO TECHNOLOGIES CORP. | 900 Great Southwest Pkwy SW | Atlanta, GA 30336 USA

Phone +1 (404) 924-6900 | Fax +1 (404) 629-6666

beko@bekousa.com | www.bekousa.com

Subject to technical changes without prior notice; the information provided does not represent characteristics of state within the meaning of the German Civil Code (BGB).

® Registered Trademarks by BEKO TECHNOLOGIES GmbH, Neuss, Germany and BEKO TECHNOLOGIES CORP, Atlanta, GA USA.