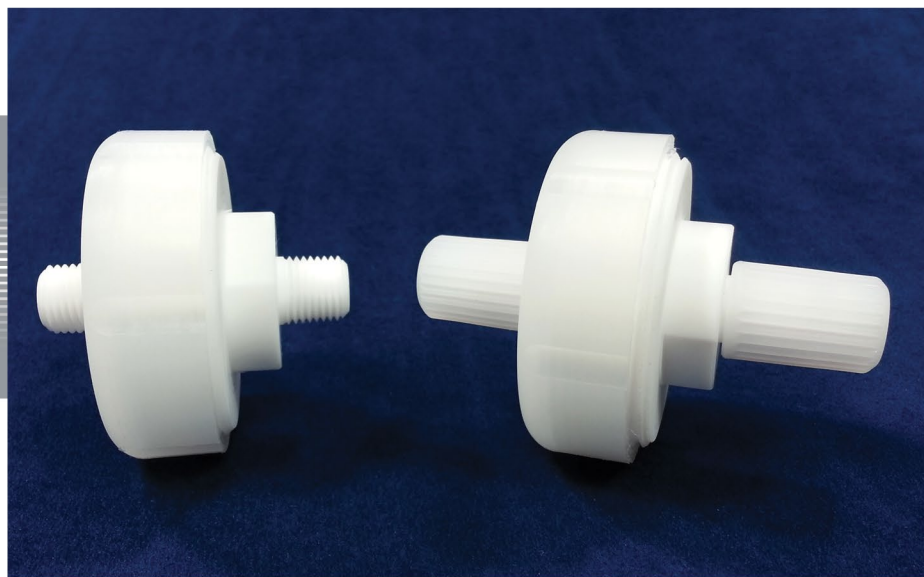




international polymer solutions

Teflon Disc Filter

The **IPS Teflon Disc Filter (TDF)** has been designed to fulfill the special requirements of inline microfiltration for sensitive medias. All contact surfaces are constructed so that nothing but PTFE comes into contact with the media being filtered. The Disc Filter utilizes replaceable Zitex™ filter elements which form a continuous mat of PTFE fibers. These fibers are fused together to form a screen-like membrane structure. The resultant membrane is hydrophobic and hence aqueous suspensions must be filtered at high rates to overcome surface tension. Because of the non-stick characteristics of PTFE, the natural lubricity of all wetted surfaces, and the easy replacement of filter elements, entrapped contaminants may be easily removed.



Specifications:

Pressure Rating 0 - 60 psi

Temperature Rating

Ambient 32°F - 160°F (0°C - 72°C)

Media 0°F - 260°F (-18°C - 127°C)

| PTFE Zitex Disc Filter | Size | Nominal Pore (MICRONS) |
|-----------------------------------|------|------------------------|
| Ultra Fine Zitex PTFE Disc Filter | 47mm | 1.5 |
| Fine Zitex PTFE Disc Filter | 47mm | 4.5 |
| Medium Zitex PTFE Disc Filter | 47mm | 15 |
| Course Zitex PTFE Disc Filter | 47mm | 25 |



| P/N | DESCRIPTION | INLET/OUTLET |
|----------------|-----------------------------|--------------|
| TDF-47-XXX-4T | Filter Assembly 47mm (1.85) | 1/4 Tube |
| TDF-47-XXX-4FP | Filter Assembly 47mm (1.85) | 1/4 FNPT |
| TDF-47-XXX-4MP | Filter Assembly 47mm (1.85) | 1/4 MNPT |
| TDF-47-XXX-4FF | Filter Assembly 47mm (1.85) | 1/4 Flared |

NOTE: XXX REPRESENTS THE LAST 3 DIGITS OF THE FILTER MEMBRANE PART NUMBER.

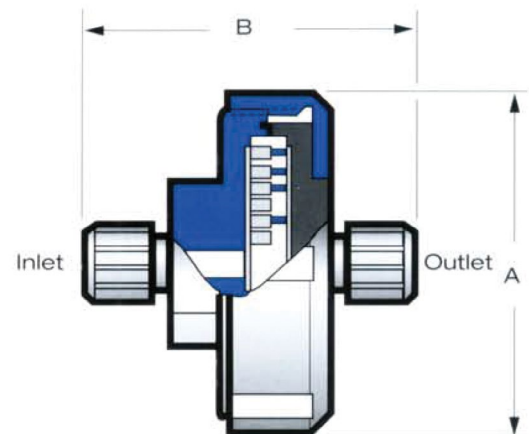
EXAMPLE: FOR 1/4 FNPT ASSEMBLY WITH FM104 MEMBRANE. THE P/N IS: TDF-47-104-4FP

| IPS NO. | Max. Function Pore Size (microns) | Nominal Thickness | Flow Rates | | | Initiation Pressure for Water | Ethanol Bubble Point | Approx. Pore Vol. | Pore Density |
|---------|-----------------------------------|-------------------|------------|-----------|-------------|-------------------------------|----------------------|-------------------|--------------|
| | | | Water* | | Air** | | | | |
| | | | in | A | B | secs | psi | psi | % |
| G-110 | 1 - 2 | 0.010 | 20 - 30 | 80 - 120 | 5 - 6 | 5.5 - 6.5 | 1.00 - 1.40 | 40 | Ultra Fine |
| G-108 | 3 - 5 | 0.008 | 30 - 50 | 120 - 200 | 4 - 5 | 3.5 - 4.5 | 0.80 - 1.20 | 45 | Fine |
| A-145 | 10 - 20 | 0.0045 | 30 - 80 | 120 - 320 | 1.50 - 2.50 | .90 - 1.8 | 0.40 - 0.70 | 65 | Medium |
| A-135 | 20 - 30 | 0.005 | 110 - 155 | 440 - 620 | .40 - .70 | .60 - 1.2 | 0.25 - 0.40 | 65 | Coarse |

*Water Flow Rate: A = Gallons/minute/ft² @ 13.5 psi., B = MI/minute/cm² @70 cmHg.

**Air Flow Rate: G-Series = 100 cc/1.0 in²/20 oz. (Gurley Test), A-Series = 100cc/1.0 in²/@Δ P 0.176 psi (Gurley Test). Pressure differential necessary to overcome hydrophobic and internal resistance. Data shown is representative and not to be used as material specifications.

| SIZE | A | B |
|------|------|------|
| 4T | 2.50 | 2.17 |
| 4FP | 2.50 | 2.29 |
| 4MP | 2.50 | 2.29 |
| 4FF | 2.50 | 3.17 |



Zitex™ is the registered trademark of Saint-Gobain.

IPS Product Notes:

1. Please email Customer Service at info@ipolymer.com
2. Call us for special applications. We can manufacture our Disc Filters with special mounting and interface dimensions.
3. Upon request, alternate material selection from those listed will allow for expanding temperature ratings or other performance characteristics.
4. Unauthorized disassembly of this product will void the original factory one-year product warranty. For further details please contact your local Distributor or our factory directly.