52 Series  *Tee-Type Filters (10K, 20K)*

- Available in 303, 316 Stainless (10K) and 17-4 PH Stainless (20K)
- Flows up to 24 GPM or 1,200 SCFM
- Various Micron Ratings Ranging from .1 to 150
  Available in Stainless Steel, Micro Glass and Porous Sintered Stainless Steel
- Port Sizes Range from 1/4” to 3/4” FNPT (10K only) and 1/4” to 3/4” MP Port and HP Ports

**Optional Accessories**

- Visual Indicator Setting: 40 PSID
- Relief Valve Setting: 50 PSID
- Bowl Drain: 1/8” and 1/4” FNPT (10K only)
- 1/4” MP Ports
- Gauge Ports: 1/8” and 1/4” FNPT (10K only)
- 1/4” MP Ports

**Pressure Ratings**

<table>
<thead>
<tr>
<th>303 and 316 Stainless (10K)</th>
<th>17-4 PH Stainless (20K)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Operating: 10,000 PSI</td>
<td>Operating: 20,000 PSI</td>
</tr>
<tr>
<td>Proof: 15,000 PSI</td>
<td>Proof: 30,000 PSI</td>
</tr>
<tr>
<td>Burst: 40,000 PSI</td>
<td>Burst: 80,000 PSI</td>
</tr>
</tbody>
</table>

**Temperature Ratings**

<table>
<thead>
<tr>
<th>Elements</th>
</tr>
</thead>
<tbody>
<tr>
<td>Micro Glass -65°F to +325°F</td>
</tr>
<tr>
<td>Stainless -425°F to +1000°F</td>
</tr>
<tr>
<td>Sintered -425°F to +1000°F</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>O-Rings</th>
</tr>
</thead>
<tbody>
<tr>
<td>Buna -40°F to +250°F</td>
</tr>
<tr>
<td>Viton -20°F to +400°F</td>
</tr>
<tr>
<td>EPR -60°F to +400°F</td>
</tr>
<tr>
<td>Kalrez -40°F to +550°F</td>
</tr>
<tr>
<td>Teflon Encapsulated Viton -4°F to +400°F</td>
</tr>
</tbody>
</table>

**Temperature Ratings**

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</table>
Flow Data (Pressure Drop vs. Flow)

**51E - Flow Data - 10 GPM Size**

Filter Housing Less Element

51E Series Micro Glass Elements

51E Series Stainless Elements

**52E - Flow Data - 16 GPM Size**

Filter Housing Less Element

52E Series Micro Glass Elements

52E Series Stainless Elements

**53E - Flow Data - 24 GPM Size**

Filter Housing Less Element

53E Series Micro Glass Elements

53E Series Stainless Elements

**NOTE:**

Add pressure drop of the housing to that of the element to obtain total initial clean pressure drop of the assembly.

To determine pressure drop for a different viscosity and density fluid, use the following conversion factor:

\[
\text{New } \Delta P = \Delta @ 100 \text{ SSU} \times \frac{\text{new viscosity, SSU}}{100 \text{ SSU}} \times \frac{\text{new spec. gravity}}{0.9}
\]
### 51 Series How to Order

#### Example Part Number

<table>
<thead>
<tr>
<th>A</th>
<th>B</th>
<th>C</th>
<th>D</th>
<th>E</th>
<th>F</th>
<th>G</th>
<th>H</th>
<th>I</th>
<th>J</th>
<th>K</th>
</tr>
</thead>
<tbody>
<tr>
<td>51</td>
<td>P</td>
<td>10</td>
<td>4</td>
<td>MP</td>
<td>10S</td>
<td>E</td>
<td>N</td>
<td>V</td>
<td>B2</td>
<td>B25</td>
</tr>
</tbody>
</table>

#### Sections

**Section A**
- **Description**: Tee-Type filters up to 20,000 PSI
- **Code**: 51

**Section B**
- **Filter Series**: 51
- **Part Number**: 51 P

**Section C**
- **Housing Material & Pressure**
  - 303 Stainless 10,000 PSI: S
  - 316 Stainless 10,000 PSI: T
  - 17-4PH Stainless: P

**Section D**
- **Flow - GPM/SCFM**
  - 10 GPM / 300 SCFM: 51E
  - 16 GPM / 600 SCFM: 52E
  - 24 GPM / 1200 SCFM: 53E

**Section E**
- **Element Size**
  - 1/4": 4
  - 3/8": 6
  - 1/2": 8
  - 9/16": 9
  - 3/4": 12

**Section F**
- **Micron Rating/Material**
  - 316 Sintered SSTL: 0.2
  - 316 Sintered SSTL: 0.7
  - 316 Sintered SSTL: 2
  - 316 Sintered SSTL: 5
  - Microglass 3250 PSID: 1
  - Microglass 3250 PSID: 3
  - Microglass 3250 PSID: 5
  - Microglass 3250 PSID: 10
  - Microglass 3250 PSID: 25
  - 304 SSTL: 2
  - 304 SSTL: 5
  - 304 SSTL: 10
  - 304 SSTL: 20
  - 304 SSTL: 40
  - 304 SSTL: 75
  - 304 SSTL: 75
  - 304 SSTL: 100
  - 304 SSTL: 150

**Section G**
- **Collapse Rating**
  - 300 PSID Microglass: C
  - 3250 PSID Microglass: D
  - 4500 PSID Stainless Wire: E
  - 2000 PSID 316 Sintered: F

**Section H**
- **O-Ring Material**
  - Buna: N
  - Viton®: V
  - EPR: E
  - Kalrez®: K
  - Teflon Encapsulated Viton: S

**Section I**
- **Optional Accessories**
  - Visual Indicator: V
  - Electrical Indicator: E
  - 1/8" NPT AP Ports *10,000 PSI Only: D1
  - 1/4" NPT AP Ports *10,000 PSI Only: D2
  - 1/4" MP AP Ports: MP4

**Section J**
- **Optional Bypass**
  - 1/8" NPT *10,000 PSI Only: B1
  - 1/4" NPT *10,000 PSI Only: B2
  - 1/4" MP: MP4

**Section K**
- **Insert Pressure Setting**
  - B**

**Section L**
- **Optional Bypass**
  - **Default Setting is 50 PSID**

**Replacement Element**

<table>
<thead>
<tr>
<th>A</th>
<th>B</th>
<th>C</th>
<th>D</th>
<th>E</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td>51</td>
<td>E</td>
<td>10S</td>
<td>E</td>
<td>N</td>
<td>5</td>
</tr>
</tbody>
</table>

**Section C**
- **Description**: See Section C for Element Size

**Section E**
- **Element Size**: See Section C for Element Size

**Section F**
- **Micron/Material**: See Section F for Micron Rating

**Section G**
- **Collapse Rating**: See Section G for Collapse Rating

**Section H**
- **O-Ring Material**: See Section H for O-Ring Material

---

**Testing without leakage to 60,000 PSI**

**Default Setting is 50 PSID**