

W620 In-Line Cartridge Filters

Working Pressures to: 6000 *psi*
41,400 kPa
414 bar

Rated Static Burst to: 15,000 *psi*
103,400 kPa
1034 bar

Fatigue Pressure Rating: 3000 *psi*
20,700 kPa
207 bar

Flow Range to: 150 *gpm*
568 *lpm*



Applications

- High Pressure Circuits
- In-Plant Systems
- Meets HF3 Specification
- Mobile Equipment

Features

The W620 filter assembly contains the popular HF3 filter. It offers a reverse flow bypass valve option available for hydrostatic transmissions. Donaldson DT high-performance 4-layer media is offered in five different media grades. The differential pressure indicator line is designed to work with the wide assortment of bypass valves. Thermal lockout and surge control are two key features incorporated in many of the differential pressure indicators.

- Conforms to HF3 specifications
- Head material: cast iron
- Housing material: steel
- Reverse flow bypass valve option available

Beta Rating

- Performance to $\beta_{<4(c)}=1000$

Porting Size Options

- SAE-16, -20, 24 O-ring
- 1¼" SAE 4-Bolt Flange Code 61 or 62
- 1½" SAE 4-Bolt Flange Code 61

Assembly Weight

- 9": 26 lbs / 11.79 kg
- 13": 33 lbs / 14.97 kg
- 18": 42 lbs / 19.05 kg
- 22": 48 lbs / 21.77 kg

Replacement Filter Lengths

- 8" / 203.2mm
- 13" / 330.2mm
- 16" / 406.4mm

Standard Bypass Ratings

- 90 psi / 621 kPa / 6.2 bar
- 50 psi / 345 kPa / 3.5 bar
- No Bypass

Operating Temperatures

- -20° to 250°F (-29° to 121°C)

Filter Collapse Ratings

- 150 psi / 1034 kPa / 10.3 bar (standard)
- 3000 psi / 20,700 kPa / 206.8 bar (high collapse)



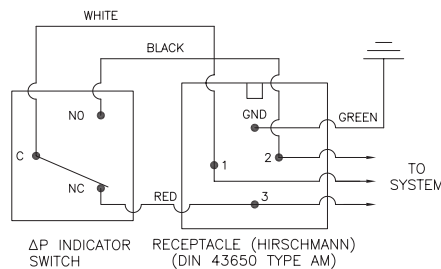
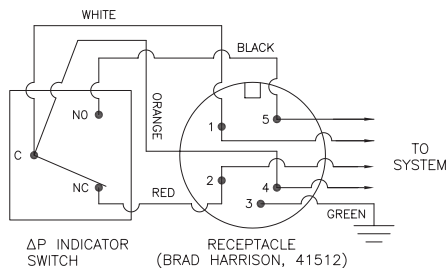
W620
Max Flow: 150 gpm (568 lpm)



W620 Specification Illustrations

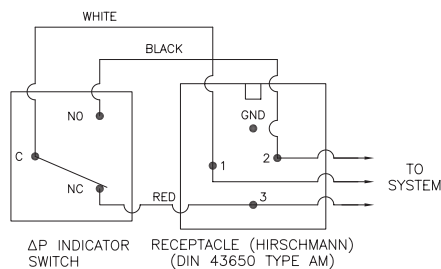
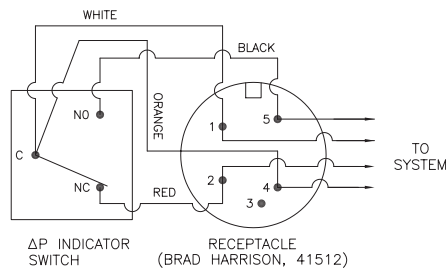
All dimensions are shown in millimeters [inches].

Indicator Switch Schematic Wiring Diagram Aluminum Electrical Housings



Note: The female plug (connector) is to be furnished by customer.

Plastic Electrical Housings



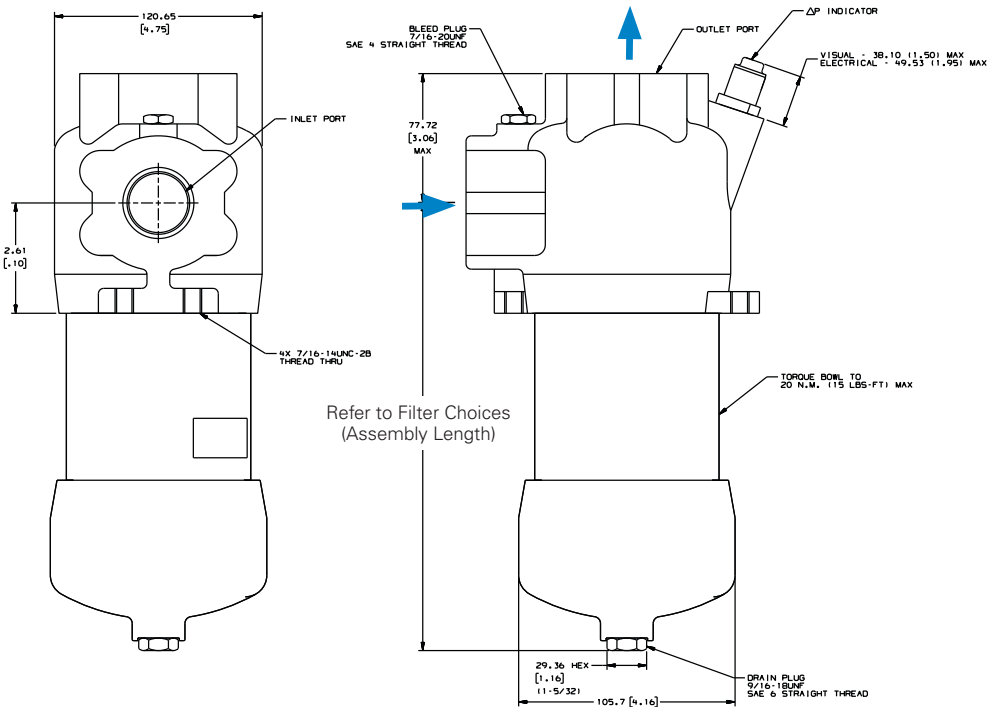
Note: The female plug (connector) is to be furnished by customer.

Differential Indicators: Indicators are designed to actuate at approximately 80% of bypass valve cracking pressure. It is recommended that an indicator with a bypass setting of 100 psid is used with a non-bypass housing.

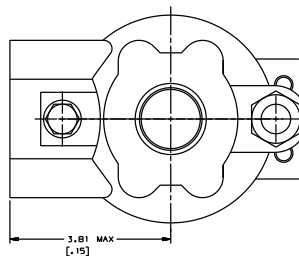
Surge Control: This optional feature is used to dampen pressure surges or spikes to avoid premature actuation of the indicator. Surge control delays the indicator response.

Thermal Lockout: The Thermal Lockout prevents premature signaling of a bypass condition created by viscous fluid during cold start-ups. Normal indicator actuation capability is resumed once the operating temperature of the fluid reaches approximately 80°F / 27°C.

Assembly - Side View



Head - Top View



W620 Components

High-Performance DT Filter Choices

Media Type	$\beta_{x(c)} = 1000$ Rating based on ISO 16889	Length		Donaldson Part No.	Comments
		in	mm		
DT Synteq Synthetic	<4 μ m	8	208.8	P566209	DT-9600-8-2UM
	5 μ m	8	208.8	P566210	DT-9600-8-5UM
	8 μ m	8	208.8	P566211	DT-9600-8-8UM
	12 μ m	8	208.8	P566212	DT-9600-8-14UM
	23 μ m	8	208.8	P566213	DT-9600-8-25UM
	5 μ m	8	208	P566366	DT-9601-8-5UM, High collapse
	12 μ m	8	208	P566367	DT-9601-8-14UM, High collapse
	<4 μ m	8	208	P567875	DX2-9600-8-2UM
	5 μ m	8	209	P565122	DX2-9600-8-5UM
	8 μ m	8	209	P565123	DX2-9600-8-8UM
	12 μ m	8	209	P564936	DX2-9600-8-14UM
	<4 μ m	13	327.8	P566214	DT-9600-13-2UM
	5 μ m	13	327.8	P566215	DT-9600-13-5UM
	8 μ m	13	327.8	P566216	DT-9600-13-8UM
	12 μ m	13	327.8	P566217	DT-9600-13-14UM
	23 μ m	13	327.8	P566218	DT-9600-13-25UM
	5 μ m	13	326.3	P566368	DT-9601-13-5UM, High collapse
	12 μ m	13	326.3	P566369	DT-9601-13-14UM, High collapse
	<4 μ m	13	327	P567876	DX2-9600-13-2UM
	5 μ m	13	327	P565188	DX2-9600-13-5UM
	8 μ m	13	327	P565189	DX2-9600-13-8UM
	12 μ m	13	327	P565187	DX2-9600-13-14UM
	<4 μ m	16.84	427.8	P566219	DT-9600-16-2UM
	5 μ m	16.84	427.8	P566220	DT-9600-16-5UM
	8 μ m	16.84	427.8	P566221	DT-9600-16-8UM
	12 μ m	16.84	427.8	P566222	DT-9600-16-14UM
	23 μ m	16.84	427.8	P566223	DT-9600-16-25UM
	5 μ m	16.84	427.8	P566370	DT-9601-16-5UM, High collapse
	12 μ m	16.84	427.8	P566371	DT-9601-16-14UM, High collapse
	<4 μ m	16.81	427	P567877	DX2-9600-16-2UM
	5 μ m	16.81	427	P565196	DX2-9600-16-5UM
	8 μ m	16.81	427	P565197	DX2-9600-16-8UM
	12 μ m	16.81	427	P565195	DX2-9600-16-14UM



Filter Notes

- All Donaldson DT and DX2 filters utilize glass fiber media with an epoxy-based resin system for the ultimate in chemical compatibility.
- All Donaldson DT and DX2 filters are potted with epoxy-based adhesives.
- Standard collapse DT designs are double wire-backed using epoxy-coated steel mesh for maximum pleat support and dirt capacity.
- High collapse designs are double wire-backed using stainless steel mesh.
- High collapse designs are also potted into machined aluminum endcaps for greater filter integrity in critical applications.
- Viton® seals are standard on all Donaldson DT and DX2 filters. Viton® is a registered trademark of E. I. DuPont de Nemours and Company.
- DX2 filters utilize nylon mesh for pleat support.