MODEL 50 LARGE DUPLEX BASKET STRAINER

10" to 18" • Iron and Bronze • Flanged

Convoluted Basket Design



Features

- Continuous flow no shutdown for basket cleaning
- Compact butterfly valve design
- Quick opening covers
- Convoluted-design baskets
- Threaded drain
- Perforated or mesh stainless steel baskets
- Vent
- Positive shutoff

Options

- Ductile iron construction
- Basket perforations from 1/32" to 1/2"
- Basket mesh 20 or 40
- Monel baskets
- Vent valves
- Drain valves
- 1/4" NPT taps
- Pressure differential gauge and switch connections
- Magnetic basket inserts

he Eaton Butterfly Valve Type Model 50 Duplex Basket
Strainer is a special design with several important features
and advantages for large size pipelines with high flow rates.

Flow is switched from one basket chamber to the other by a pair of synchronized, high quality butterfly valves. This replaces the diverter plug used on smaller size strainers and gives a straight flow pattern with no sudden changes in flow direction. The result is a very low pressure loss. A 10" strainer of this type, for example, can handle 2000 gpm of water with a pressure drop on only 2 psi. This is the strainer to choose when you have a high flow rate application and a low pressure loss is critical.

Another important benefit of this new design is a saving in overall size. It is more compact than other large size duplex strainers – which means less weight and a smaller profile. This can be very important when space requirements are tight.

This design also uses a new, unique basket design concept which incorporates a larger screening area. This is done by convoluting (pleating) the perforated sheet in the strainer basket, thus increasing the available screening area while reducing the total basket size. The flow enters the basket from the side, not the top — resulting in a straight-through flow pattern. What all this means in service is a lower pressure drop and greater time between basket

cleanings than would be possible with standard-design baskets...a real savings in time and operating costs.

The butterfly valve assembly used to divert the flow from one basket chamber to the other is balanced so a minimum of effort is needed to switch the flow. There is a single handwheel operator, and it can be located on either side of the strainer if accessibility is a problem. There is an arrow on the top of the gear housing that indicates which basket chamber is in service and which is ready for cleaning.

Quick opening covers make strainer basket changing or cleaning quick and easy. No tools or lifting gear are required to open them. This is a feature not often found on strainers of these larger sizes.

If your strainer application is for larger size pipelines with high flow rates, the Eaton Model 50 Butterfly Valve offers you several unique features and advantages over other large size duplex strainers. Among them are...low pressure loss, operator friendly with quick open covers that don't require lifting gear, compact design with a smaller footprint than other strainers, and a special basket design to maximize time between basket cleanings. After you've investigated all the possibilities, you'll realize that this large size Eaton Model 50 Duplex Strainer is in a class by itself...and it's cost effective.

Selection Chart

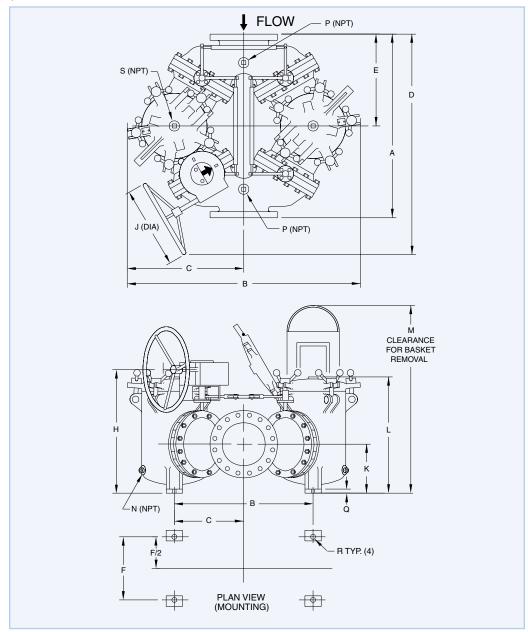
Size	Material	End Connection	Seals	Pressure Rating		
10" to 12"	Iron	Flanged 125#		200 psi @ 100F		
10 10 12	Bronze	Flanged 150#	Buna N	200 psi @ 100F		
14" to 18"	Iron	Flanged 125#	Dulla IV	150 psi @ 100F		
14 10 16	Bronze	Flanged 150#		130 psi @ 100i		

C_v Factors*

Size	Value	Size	Value
10″	1300	16″	3400
12″	2000	18″	4900
14″	2900		

^{*} For water with clean, perforated basket

Technical Details



Dimensions and weights are for reference only. Contact us for certified drawings.

Dimensions (inches / mm) Model 50 Large Duplex Strainer

Pipe Size	Α	В	С	D	E	F	G	Н	J	К	L	М	N	Р	Q	R	s	Wt (I Iron	b) (kg) Bronze
10	45	51 1295	26 660	52 1321	22-1/2 572	19 483	32 813	30-1/4 768	18 457	12-3/16 310	29 737	49 1245						1600 727	2003 910
12	62	64 1626	32 813	66 1676	31 787	23 584	41 1041	36-5/8 924	16 406	16-3/4 425	38 965	66 1676						2650 1205	3318 1508
14	72	76 1930	38 965	79 2007	35-1/2 902	27 686	48 1219	44-3/4 1137	24 610	18-3/4 476	44-1/2 1130	77 196	1-1/2 50	1/2 20	1 32	1 32	1/4 -	4300 1955	5384 2447
16	72	76 1930	38 965	79 2007	35-1/2 902	27 686	48 1219	44-3/4 1137	24 610	18-3/4 476	44-1/2 1130	77 196						4400 2000	5509 2504
18	72	76 1930	38 965	79 2007	35-1/2 902	27 686	48 1219	44-3/4 1137	24 610	18-3/4 476	44-1/2 1130	77 196							