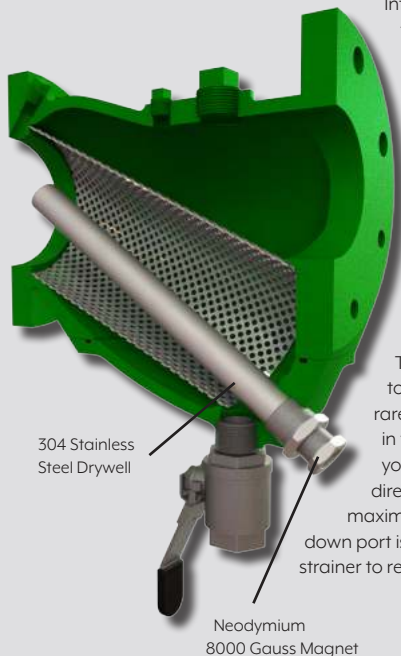


THE LOWEST PRESSURE DROP Y-STRAINER ON THE MARKET, UPGRADED WITH A MAGNET TO CATCH IRON OXIDES.



Introducing the LPD-Mag from the Metraflex company—the lowest pressure drop Y-Strainer on the market, upgraded with a Neodymium magnet to catch iron oxides. The LPD-Mag is the industry's first strainer solution to pump seal failures caused by iron oxide within the water system.

The Low Pressure Drop Y-Strainer from Metraflex was the result of a completely re-engineered design of the traditional Y-Strainer. The LPD Y-Strainer provides a much lower pressure drop and at the same time a much higher debris capacity than any Y-Strainer or basket strainer on the market.

The LPD-Mag works as a traditional LPD Y-Strainer to filter out debris within the system. The Neodymium rare-earth magnet installed within the strainer assists in the removal of iron oxide buildup, helping to assure your system runs smoothly. The magnet is installed directly in the flow and into the collection vortex of the LPD, maximizing the magnet's ability to catch iron oxide. The blow down port is designed to allow for a thorough blow down of the strainer to remove metallic and non-metallic debris, while in service.

WARNING

These magnets are surprisingly strong— Please read this completely.

Contact Metraflex with questions. Please be advised that any magnetic field can influence the performance of any cardiac conduction devices (pacemakers, ICDs, etc.) and could be unintentionally deactivated. Magnets can move unpredictably and the larger the magnet, the more dangerous they become. When separated, magnets can attract to each other or something magnetic in their surroundings. This can happen spontaneously causing the magnets to crack. Keep magnets dry all the time. Do not put grease on the magnets. System media may be hot, use caution. Standard magnets are rated for no higher than 212 degrees F, for higher temperatures special magnets required. When blowing down use proper safety precautions.

IN-SERVICE BLOW DOWN PROCEDURE



The magnets are constantly collecting magnetic debris while at the same time larger foreign materials are being captured in the perforated stainless steel screen.



To ensure all the particles captured are blown out during the blow down process, slowly draw the magnet(s) out of the drywell and stop when you see **the red line.**



Open the valve and blow down for 3 to 5 seconds and at the same time pull the magnet the rest of the way out. Then shut the blow down valve. Re-insert the magnet.

NO-FLOW BLOW DOWN PROCEDURE

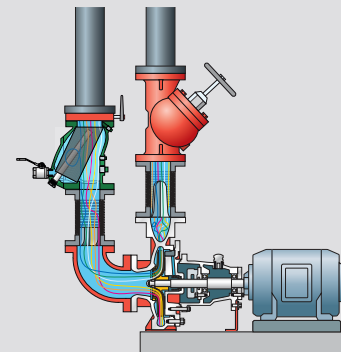
If possible, temporarily turn off the pump or isolate strainer for no Flow. Slowly remove the magnet(s) from the drywell. This process should take 10-15 seconds per magnet. Open the blow down for 3 to 5 seconds.

- For strainers with 2 magnets. Follow the above instructions doing one magnet at a time. 10" and larger are supplied with two magnets, make sure to keep the magnets separated. See precautions at bottom.
- When reinstalling the magnet into the drywell, DO NOT USE Teflon tape or thread compound. Simply be sure the magnet is clean and tighten finger-tight.
- Normal strainer blowdown, to remove debris, can be done at any time. However the magnets are so strong most magnetic particles will not be removed unless the steps above are followed.

RECOMMENDED PLACEMENT

The LPD-Mag is designed to capture magnetic particles that range from visible rust/metallic chips to very fine powder.

It is recommended to place the LPD Mag upstream of any pump with an ECM motor, boilers or any equipment you wish to protect.



SPECIFICATIONS

1.0 General

- 1.1 "Y" Pattern pipeline strainers shall be installed where shown on plans or required by equipment manufacturers.
- 1.2 Standards
 - 1.2.1 Strainer body shall be ASTM A126 B Cast Iron.
 - 1.2.2 Flanges shall be ASME B16.5

2.0 Product

- 2.1 Y Strainer shall be model "LPD-Mag" as manufactured by The Metraflex Company®, Chicago, IL.
- 2.2 Y Strainer shall be of the low pressure drop design with the following CV values;

2" Pipe	120
2½" Pipe	165
3" Pipe	236
4" Pipe	460
5" Pipe	641
6" Pipe	952
8" Pipe	1580
10" Pipe	2424
12" Pipe	3576

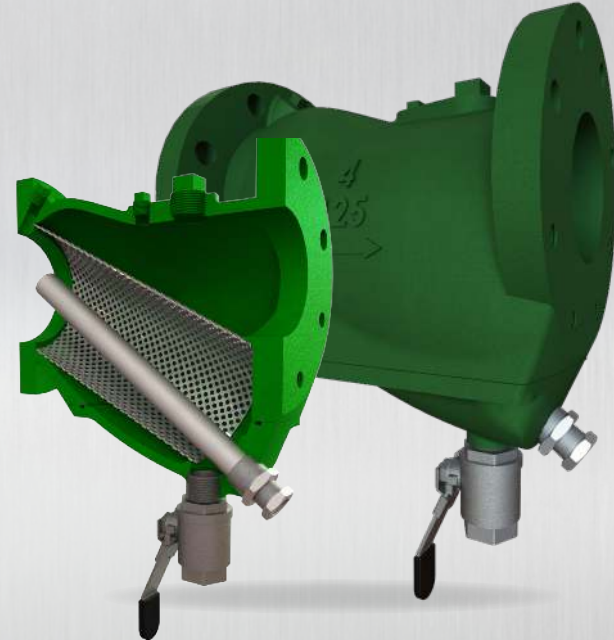
- 2.3 LPD-Mag should be equipped with minimum 8000 Gauss magnet(s)
- 2.4 8" and smaller shall have one magnet, 10" and larger shall have two
- 2.5 Magnets shall be neodymium
- 2.6 304 Stainless steel magnet tube shall be installed in a 304 stainless steel drywell
- 2.7 Screens shall be Type 304 Stainless steel.
- 2.8 Screen perforations shall be;
 - 2.8.1 For liquid service for sizes 2" – 3" perforation shall be .045"
 - 2.8.2 For liquid service for sizes 4" – 12" perforation shall be .125"
 - 2.8.3 For steam service for sizes 2" – 6" perforation shall be .045"
 - 2.8.4 For steam service for sizes 8" – 12" perforation shall be .062"
- 2.9 Strainer shall have a screen pitch of 20-25°
- 2.10 Screens shall be removable via a access cover sealed with O-ring.
- 2.11 Strainer shall be manufactured with .25" pressure differential ports, with one placed on each side of the screen.
- 2.12 Strainer shall be equipped with a dry well port. Port shall be .5" for sizes 2" – 3" and 1" for sizes 4" – 12".
- 2.13 Strainer connection shall be 125 lb. class flange.

1.0 Execution

- 3.1 Y Strainer shall be installed in accordance to manufacturer's recommendations and contact requirements.
- 3.2 Screen perforation shall be in accordance to equipment of manufacturer's

THE LPD-MAG

Y-STRAINER WITH MAGNETIC INSERTS



INFORMATION PACKET

Metraflex
for pipes in motion

1-800-621-4347