

Self Cleaning Filter » Disc Filter



Disc Type Self Cleaning Filter is used for highly viscous material filtration like Greece, Lube Oil, Edible Oil, Toothpaste & many more. Here, we don't required any backwashing media to clean the Filter Element. It is working under principle of differential pressure parameters for uninterrupted filtration requirement.

Construction

Disc type self-cleaning filter is constructed of filter housings, filter elements, and drain valve. It also has a pneumatic cylinder and timer-based drain valve. Filter housings can be offered in various materials of construction such as various grades of stainless steel, carbon steel and alloy metal. Filter elements can be offered with wedge wire, sintered multi-layer wire mesh, plain wire mesh and sintered metal powder configuration. They are selected based on the requirement of filtration quality.

For 100 microns and more, normally it is recommended to use wedge wire element. From 2 microns to 100 microns, it is advisable to use sintered multi-layer wire mesh and plain wire mesh, depending upon the application requirement. For final filtration of 0.2 microns to 5 microns, sintered metal powder is a suitable filter media.

Customers can use pneumatically or electrically operated butterfly valve or ball valve as per their process requirement. Normally our systems are equipped with pneumatically operated solenoid valves for back washing and draining. Control panels can be offered with FLP (flame proof) and non-FLP, depending upon the process requirement.

Operation

A spring-loaded cleaning disc moves up and down inside the filter screen and removes collected contaminants. The filtrate flows from top to bottom, and from inside of the screen to outside. The contaminants that are collected on the screen are easily removed and evacuated to the collection chamber. On the down stroke, any remaining contaminants are driven downwards to the collection chamber while on the upstroke, the cleaning disc removes contaminants from the screen surface.

Features and Benefits

- No replacement costs for filter screen and no disposal expenses.
- Disc type clean permanent cartridge.
- Reduces the risk of operators in contact with the dangerous material.
- Reduces the environmental pollution.
- Reduces the labor demands and no more filter screen changeouts.
- Increases profitability, improves overall system efficiency, and reduces downtime.
- Longer life, higher accuracy, higher erosion resistance.
- Space-saving design, small and compact footprint.
- Collection and removal of contaminant from fluid being filtered, without any interruption in the operation.
- Automatic working.

Applications

• Domestic water supply
• Reverse osmosis
• Softening
• Ion exchange
• Oil field
• Paint & Inks
• Solvents
• Chemicals
• Latex
• Adhesive
• Lubricants
• Tooth Paste
• Glycol
• Cooling water

Reclaimed water

Ground water
Surface water removal
Boiler backwater
Swimming pools
Landscape water
Green spray
Agriculture irrigation water