

## DYNADRUN

### Drum filter



#### Main areas of use and features

- Food industry effluents
- Effluent polishing of waste water
- Fish farming systems
- Transport water in plastic industry
- Intake water filtration
- Pre-filtration before sand filters
- Pulp and paper industry
- Reuse water
- Industrial process water filtration

# DYNADRUM - HIGH CAPACITY, SMALL FOOTPRINT

## DynaDrum drum filter - process (how it works)

The DynaDrum is an automatic self cleaning microscreen filter designed for removal of suspended solids. Filtration opening size ranges from 10 micron to several hundreds of microns. Construction materials are chosen depending on water quality, with stainless steel, acid proof steel, duplex steel and FRP among the most common choices. The filter cloth is made of polyester or stainless steel.

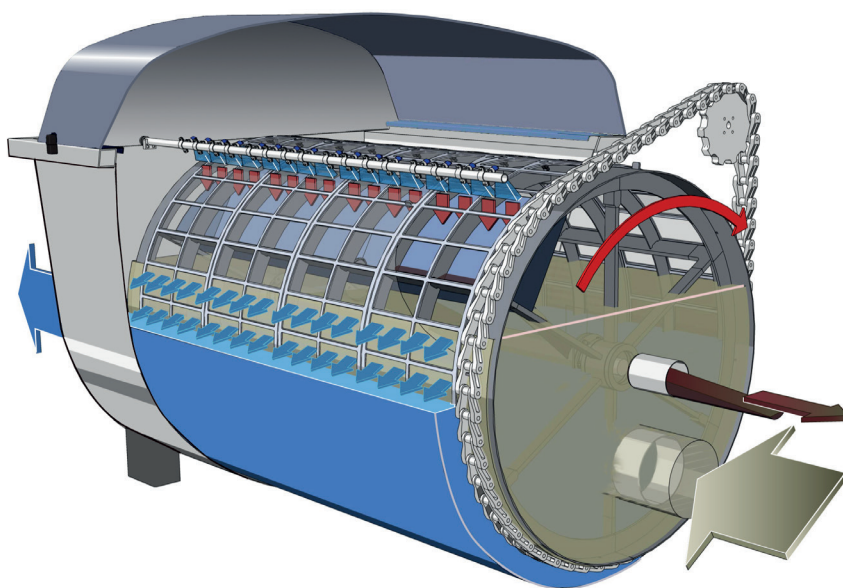
Water to be filtered is guided into the drum and flows by gravity through the filter media panels mounted on the periphery of the drum. Suspended solids are separated and accumulated on the inside of the filter media.

When the water level inside the filter drum increases to a pre-set point, the drum starts rotating and the backwash of the filter media starts. The high pressure backwash spray removes the accumulated suspended solids into the reject flume inside the filter. Within a preset range the drum rotates with optimal speed and optimal back wash water pressure, to clean the filter cloth using the filtrated water. The wash water is collected in the reject trough and is transported out through the reject pipe. The filter media is submerged to maximum 65% and the water level of the filtrate is kept by a level weir.

The DynaDrum works without pressure and has very low head loss. Low energy cost and reliable design gives low life cost.

## DynaDrum drum filter – new technology

- Automatic control system with user friendly interface through a touch panel.
- Backwash control via analog level transmitter and frequency converters for backwash pump and rotor drive. Maximum backwash efficiency and minimized energy consumption.
- New type of spray nozzle with high efficiency and minimized risk for clogging.
- Innovative design of drum and inlet sealing for quick service.
- Filter panel with integrated fastening device for quick and easy installation/replacement.
- Adjustable reject water trough to allow for minimum circulation of separated solids and lowest amount of water in reject.
- Lubrication free and corrosion free chain drive.
- Built-in emergency overflow weirs at inlet side for internal or optionally external bypass

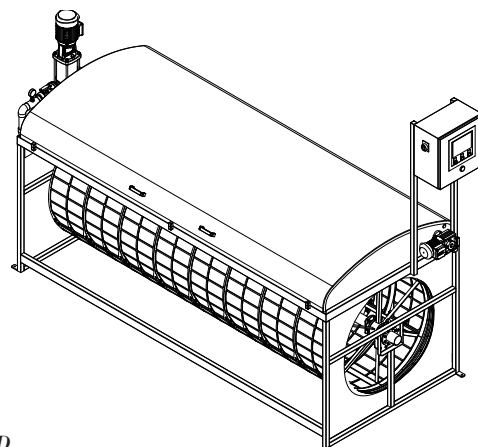


*The Water flows into the drum, and is filtered by gravity through the filter panels mounted on the periphery of the drum.*

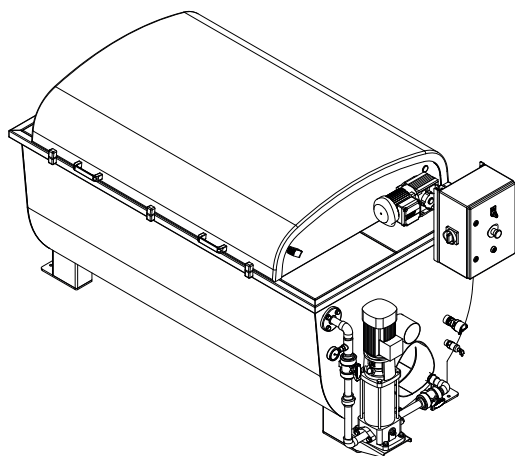
## Models

DynaDrum is available in different models and sizes, to suit the needs for different installations, as well in terms of footprint and capacity as in the choice of material.

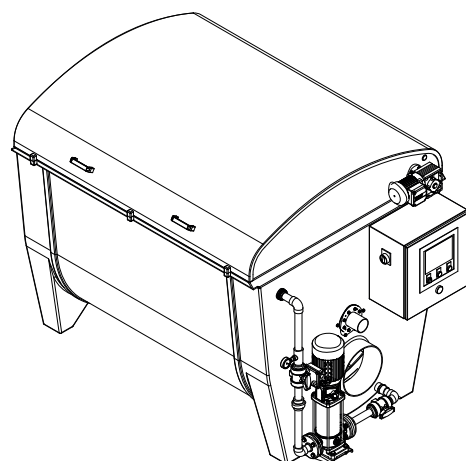
Material of frame and drum can be stainless steel, acid proof steel or duplex steel. The tank can also be built of FRP for most of the filter sizes. Covers are as a standard made of FRP but are also available in stainless steel.



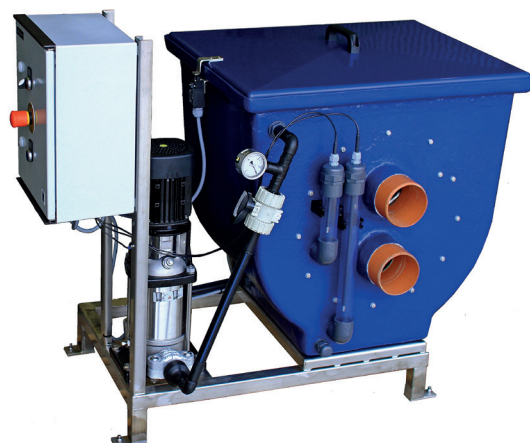
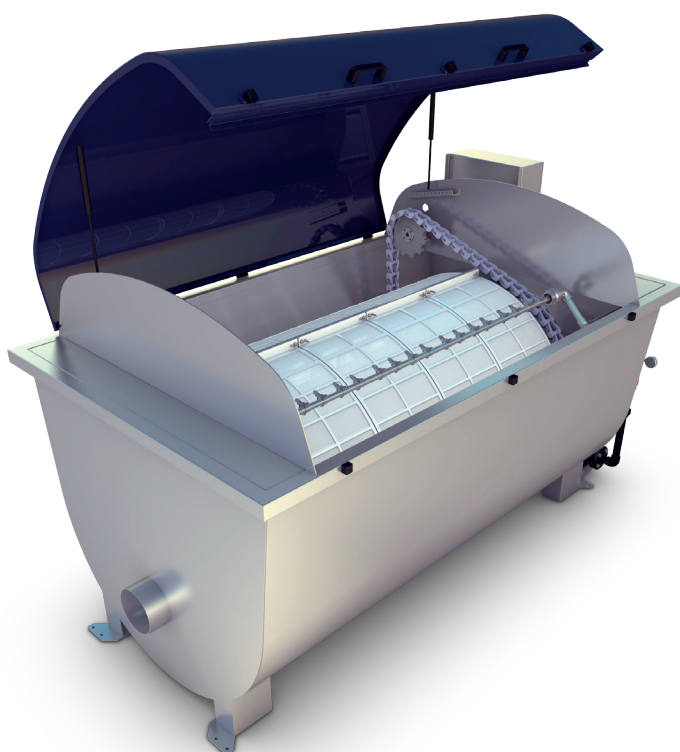
**Model CD**  
Installation in concrete tank. Frame of stainless steel, cover of FRP.



**Model TD – stainless steel**  
Free standing unit. Tank of stainless steel, cover of FRP.



**Model TD – FRP**  
Free standing unit. Tank of FRP, cover of FRP.



**DynaDrum TD 502** - the smallest DynaDrum model, version with FRP tank and duplex drum for sea water.



*The filter panels are easy to dismount.*



*Safety switch stops the drum when the lid is opened.*

## TECHNICAL SPECIFICATIONS OF THE DYNADRUM

Filter size	Drum diameter	No. of filter panels	True filter area	Drive motor effect	Pump motor effect
DD502	500mm	2 pcs	0.4m <sup>2</sup>	0.18 kW	0.55 kW
DD802	800mm	2 pcs	0.8m <sup>2</sup>	0.25 kW	0.55 kW
DD804	800mm	4 pcs	1.6m <sup>2</sup>	0.25 kW	1.1 kW
DD806	800mm	6 pcs	2.4m <sup>2</sup>	0.25 kW	1.1 kW
DD808	800mm	8 pcs	3.2m <sup>2</sup>	0.25 kW	1.5 kW
DD1203	1200mm	3 pcs	1.2m <sup>2</sup>	0.37 kW	0.55 kW
DD1206	1200mm	6 pcs	2.4m <sup>2</sup>	0.37 kW	1.1 kW
DD1212	1200mm	12 pcs	4.8m <sup>2</sup>	0.37 kW	1.5 kW
DD1218	1200mm	18 pcs	7.2m <sup>2</sup>	0.37 kW	2.2 kW
DD1224	1200mm	24 pcs	9.6m <sup>2</sup>	0.37 kW	3.0 kW