

HYDROTECH



# HDF Drumfilters. Pure filtration.

HDF

500 -  
2000

# Pure performance



**Where water needs to be  
as pure as it can be.**

Over 5,500 Hydrotech Drumfilters have  
been installed worldwide

## Hydrotech Drumfilter - Best filtration performance from an economic, mechanical filter

The Hydrotech Drumfilter is a mechanical, self-cleaning filter specially designed for high performance in systems where it is essential to prevent particles from fragmenting.

The Drumfilter uses a unique design of filter panels that ensures careful handling of solids, which is essential in achieving the high filtration efficiency required in many applications. Our Drumfilters are specially designed for the high standards of filtration demanded in industries such as aquaculture, swimming pools and industrial applications such as food processing.

### A more efficient way to purer water

The Hydrotech Drumfilter is a high performance mechanical and self-cleaning filter. The filter works without pressure and is robustly designed with few moving parts to ensure long life and low maintenance costs.

By removing fine particles before they are dissolved, the filter reduces the risk of harmful bi-products contaminating the water.

### Unique, modular Construction

Hydrotech's patented filter panels greatly simplify both the replacement and change out of the filter opening size. The drum is constructed in sections, each with up to 5 filter panels depending on diameter. This facilitates maintenance and makes it easy to adapt the filter to your flow capacity and filtration performance requirements.

The drum and tank are made of stainless (AISI304) or acid-proof steel (AISI316L). Choose from special alloys such as GRP (Glass fiber Reinforced Plastic) or duplex steel for use in extremely corrosive surroundings.

Bearing wheels, main shaft bearing and filter panels are made from resistant plastics. The filter cloth is made of polyester or stainless steel.

The Drumfilter can be automatically controlled. Hydrotech Intelligent Filtration™ controls ensure economic use of power and water.

#### Benefit from these advantages:

- Save energy through less operation of the drum and backwash pump.
- Better economy and less carbon footprint than comparable systems.
- Self-cleaning – saving on operation and maintenance costs.
- Patented filter panels simplify replacement and change out of the filter opening size for easier service and maintenance.
- Panels can be adapted to actual need of flow requirement.
- Drumfilters can easily be transported in containers.
- Produced in stainless steel, special alloys or GRP (Glassfiber Reinforced Plastic). Components adapted for the most corrosive surroundings.





# The efficient, reliable way to purer water



## **Microscreening – The efficient, reliable way to purer water**

Microscreening is an efficient and reliable technique for separation of particles from all kinds of liquids. The Hydretech Drumfilter is a mechanical and self-cleaning filter specially designed to achieve high performance in systems where it is essential to prevent the particles from fragmentation.

The filter works without pressure and is robustly designed with few moving parts to ensure long life and low maintenance costs.

## **Documentation**

Hydretech conforms to the ISO9001:2008 management system and all Hydretech filters are CE marked and delivered with O&M manuals in accordance with international standards. Hydretech still services the first models of drumfilters delivered in the 1980s. Upgraded computer systems keep track of all filters produced by Hydretech. A photo and serial number files always identify the filter. This system ensures that we always deliver the correct spare parts.

## **Hydretech Drumfilter is specially designed for filtering water in the following applications:**

- Aquaculture - perfect for fish farming systems where it is essential to prevent the particles from fragmentation. This is especially important in recirculated systems and in open systems for intake and outlet water.
- Filtering intake water from streams and lakes for municipal and industrial water supply systems
- Swimming pools
- Aquarium life support systems and zoo applications
- Effluent polishing
- Industrial applications
- Intake water
- Wastewater treatment
- Food processing
- Filtering transport water in plastic industries and purification of scrubber water in power plants.

## The highest levels of filtration efficiency

The liquid is filtered through the periphery of the drum and particles are carefully separated from the liquid through the special cell structure of the filter panels. As the filter cloth starts to clog with solids, the automatic system will start the rotation of the drum and initiate the backwash. Separated solids are rinsed off the filter cloth into the solids collection trough and then discharged.

The unique design of the patented filter panels prevents fragmentation through careful handling of the solids. This high filtration efficiency is essential in many applications.

## Flexible, modular design

The modular design incorporates 5 different drum diameters from 0.5 m to 2.0 m with filter areas from 0.35 m<sup>2</sup> for the HDF501 to 22.5 m<sup>2</sup> for the HDF 2010. In total there are 20 different drum filter sizes depending upon requirements. The standard modular filter panel measures 1.2 x 0.4 m.

## Available with two different drive systems

The Hydrotech Drumfilter is available in two drive system versions; direct drive and chain transmission. The direct drive is used on the two smallest drum sizes with 0.5 and 0.8 m drum diameter. On the chain transmission, Hydrotech has an option to deliver with maintenance free plastic chains.



Type 1, Tank



Type 2H, Open inlet



Type 2F, Open inlet  
(incl. connection for inlet channel)



Type 2, Wing walls

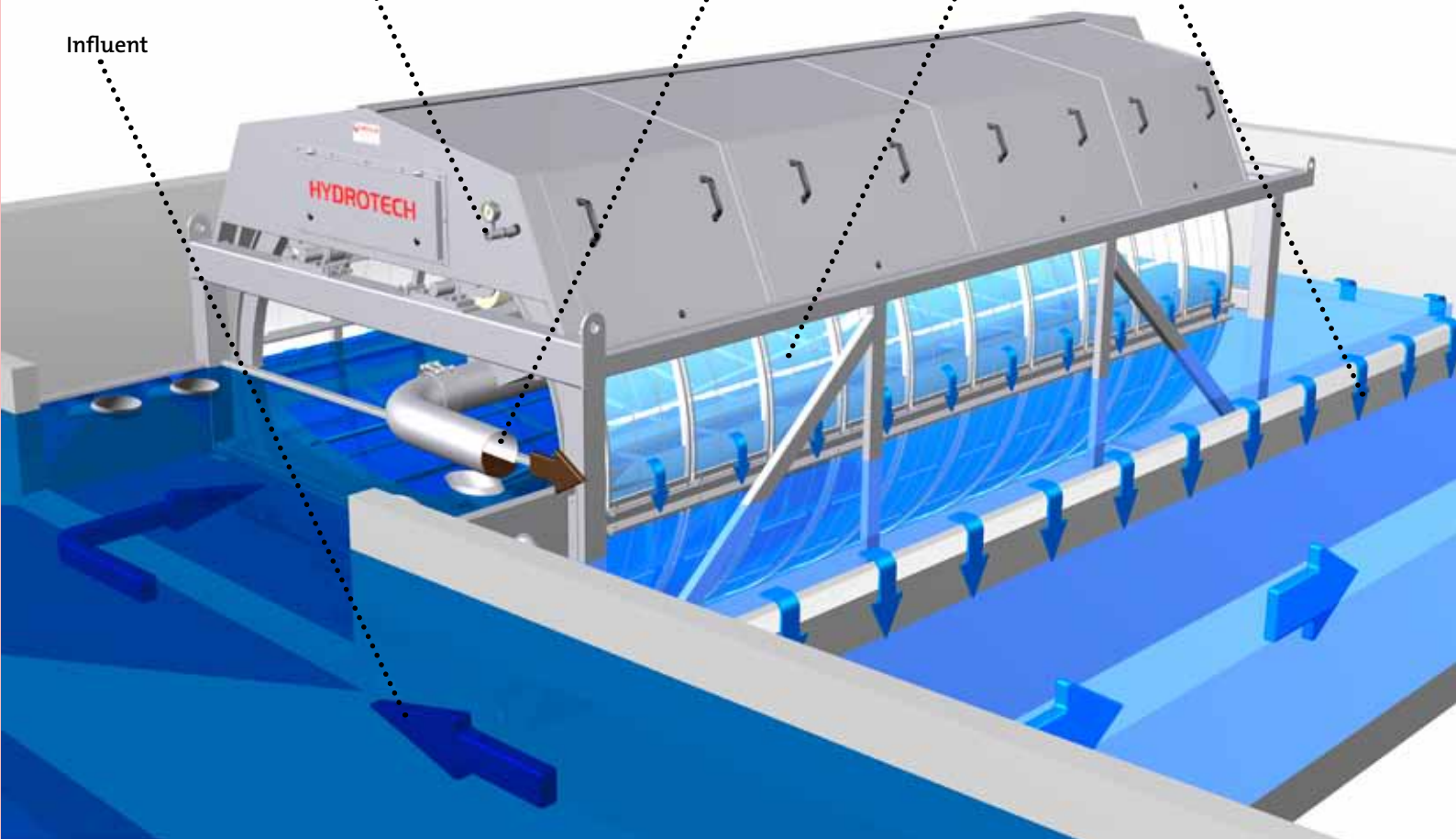
Influent

Backwash  
water inlet

Sludge/backwash  
water outlet

Filterpanels/media

Effluent



Hydrotech

Providing purer water

Pure innovation

Pure performance

Pure savings

Pure reliability

Swedish based Hydrotech is the market leader in microscreening technologies. Microscreening is used as a technique for removing particles from all types of liquid flows. Since its start in 1984, the company has manufactured and delivered around 7,000 microscreening filters worldwide.

Hydrotech recently completed the world's largest installation anywhere in the world, at Gryaab in Gothenburg Sweden.



Hydrotech is 100% focused on filter development and production. Our close co-operation with universities and institutions helps drive forward technological advancements in the area of water filtration.

We are part of Veolia Water Solutions & Technologies, one of the world's leading companies in the area of water purification. The group has more than 338,000 employees worldwide.



We offer Discfilters, Drumfilters and Beltfilters for water filtration. Waterworks, process plants and sewage treatment plants are just some of the areas using Hydrotech's water purification filters.



By building machines with a larger capacity that take up a smaller area, our filters reduce the total installation costs and more water can be filtrated using fewer machines. Our filters also filter during the backwash cycle and are self-cleaning.

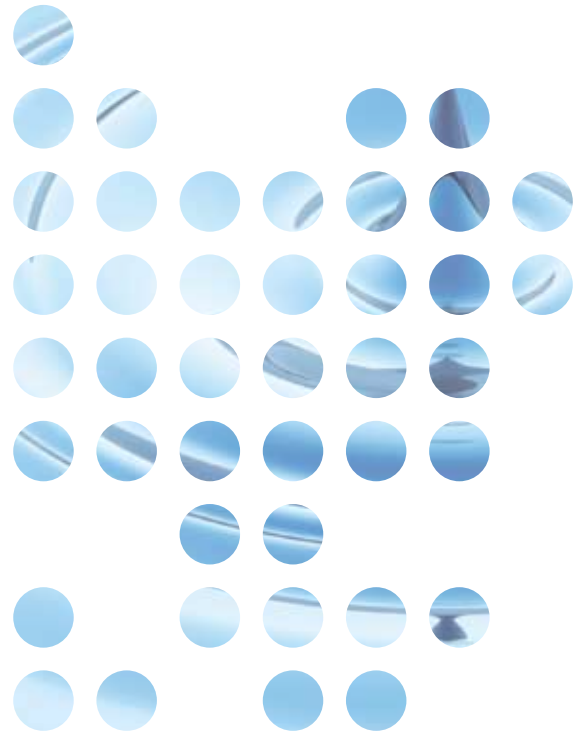
We have researched into how to reduce the carbon footprint of our water treatment processes to make them as sustainable as possible. We consider the emissions related to the materials we use, including construction as well as emissions from operations over a period of 25 years. From this we can calculate how best to reduce carbon footprint to provide our customers with the most environmentally friendly water treatment solution possible.

We always strive to offer a microscreen filter that is more cost efficient than competing systems and with a smaller carbon footprint.



Our filters are built on a proven modular build-on-demand system with short lead-times. We offer a turn-key operation that is easy to transport and assemble in-situ, meaning our filters can be operational extremely quickly. Using mechanical parts and patented processes we have managed to reduce maintenance to an absolute minimum, ensuring a quick return on investment. Our company and its processes are certified according to ISO 9001:2008, assuring the quality you would expect from us.

With over 25 years of offering service to satisfied customers we will gladly supply testimonials from satisfied customers around the world.



# HYDROTECH

Hydrotech AB,  
A Veolia Water Solutions & Technologies company

Mejselgatan 6  
235 32 Vellinge  
Sweden

Tel: +46-(0)40 42 95 30  
Fax: +46-(0)40 42 95 31  
E-mail: [mailbox@hydrotech.se](mailto:mailbox@hydrotech.se)  
[www.hydrotech.se](http://www.hydrotech.se)