

CO₂Degasser

Water treatment for aquaculture

The success of fish farming is totally dependent on the water quality.

Securing good water conditions to allow for good fish health and high production yield, is therefore one of the most vital factors.





NP Innovation's robust, easy-to-use degasser program is made in Sweden, and is a result of the various demands for self-cleaning degasser solutions with supreme efficiency – both improving water quality and reducing investment costs.

Degasser SQ series

The SQ degasser consists of several smaller modules that are mounted together. The number of modules depend on the type of model. The degassers are delivered with fan assembly as standard, although not always required for outdoor installations.

The units have a capacity of 800 L/min each which is also the optimal flow for best efficiency. The cylinders are light weight and can easily be accessed and removed from the degasser by hand and transferred to a bath solution for disinfection.



NP CO₂-degasser is a Cascade-type degasser with self-cleaning effect.

The degasser is enclosed with FRP walls and fitted with air outlet connected to a extractor fan.

NP $\mathrm{CO_2}$ -degasser is a Cascade-type degasser with self-cleaning effect. Water and air flow directions are concurrent. The fill media is made of horizontal layers of PP-panels, each with many small channels for the falling water to pass through. The water accelerates air downwards, and with intense turbulence $\mathrm{CO_2}$ is transferred to the air.

Highlights

Our degasser program is the third generation based on our modular, self-cleaning technology with supreme efficiency, both improving water quality and reducing investment costs:

- Efficient cascade solution with optimized fill media design to ensure the best conditions for CO₂ migration from water to air.
- Easy to disassemble for maintenance and disinfection.
- No moving parts ensure stable and undisturbed operation.
- Modular design and small footprint.
- Supplied either as a stand-alone unit or as build-in design for concrete chambers.
- No clogging of the degassing raster media.
- No change in efficiency over time.
- Can be retrofitted to existing fish tanks.
- Typically, 55-65 % removal efficiency is achieved, depending on degasser type, temperature, and salinity.





FREESTANDING MODELS AND MODULAR UNITS

Freestanding (tank side) degassers

The media models are formed horizontal rectangular cylinders. The choice of degasser depends on water quality parameters, flow rates, layout of the plant and in some cases of the feeding regime applied.

Freestanding tank side degasser combined with filter

NP degassing installations can be combined with NPI micro screen filters to also incorporate removal of suspended solids in the tank side re-use system. Water is typically pumped from the fish tank and into the drum filter, before making its way through the degasser and back to the fish tank by gravity.

Frame versions for installation in concrete chamber

Our program also contains frame version degassers without base tank, that are designed for installation in concrete chambers. These are normally used for centralized degassing systems used in RAS. One or several fans are used to extract and ventilate CO_2 from beneath the degasser.



NP Innovation

 a company dedicated to the development of water treatment solutions for aquaculture applications.



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