



SMART FREE STREAM

This turbine is installed on the bed of the river or canal. Especially suitable for installation in canals or behind traditional hydro power plants.

- very compact
- reliable base load supply for locations with lower incidence of debris
- almost no maintenance required



Base load power supply



Easy installation



Minimal space required



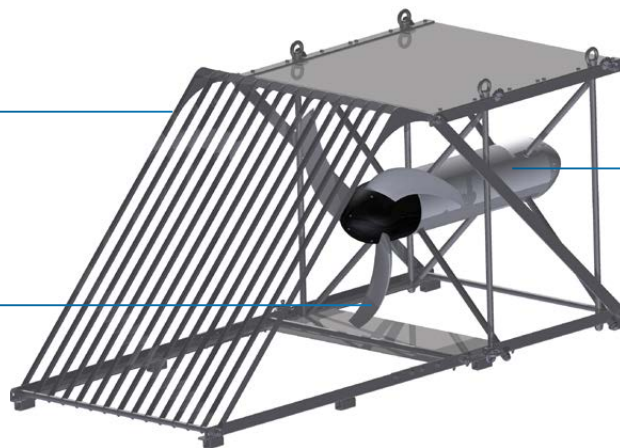
Low infrastructure costs (no dams)



No environmental impact



Minimal audible disturbance



Debris protection

stainless steel cables are carefully designed such that debris neither accumulates nor damages the blades

Rotor

slightly curved blades improve performance against debris

5 kW underwater generator

permanent-magnet generator provides three-phase AC power

Output	250 – 5000 W
Dimensions	Length: 2640 mm Width: 1120 mm Height: 1120 mm
Rotational speed	90 – 230 rpm
Weight	300 kg
Number of rotor blades	3
Rotor \varnothing	1000 mm

Specifications:

- The permanent-magnet underwater generator provides AC power
- Expandable system with multiple turbines
- Available as an off-grid solution, grid-connected and hybrid version
- Scope of delivery and specifications can be adapted to special projects
- Max. power output 3.1 m/s
- The turbine placed on the bottom of the river/canal

Anchorage dependent on:

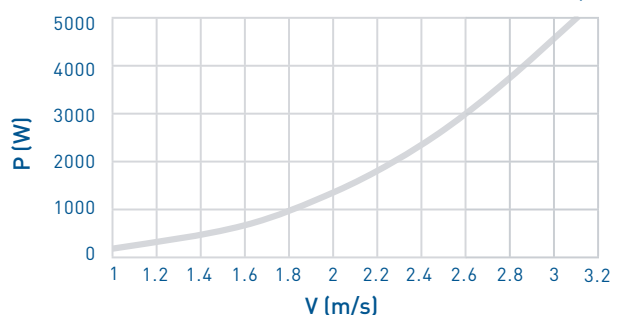
- Hydrological characteristics (e.g. riverbed type: rock, sand, etc.)
- Ship traffic/kayak/tourism
- Amount/type of flotsam/debris

Requirements:

- Min. river depth: 1.1 m
- Min. river width: 1.2 m
- Injection point: max. 500 meters distance from turbine

Output curve of the generator

Max. power output at 3.1 m/s



Power curve tested at towing tank of SVA Potsdam. Results may vary in natural rivers & canals. Curve was measured at the generator output.