QuantumFlux™ S1522

MBR & Submerged UF Membrane Data Sheet

QuantumFlux™ Submerged UF hollow fiber membranes are engineered with Polyvinylidene Fluoride (PVDF) chemistry through the TIPS* process, ensuring exceptional chemical and mechanical durability. Its wide range of module configurations enables users to select the optimal setup for new projects or seamlessly retrofit into existing installations.

*TIPS: Thermally Induced Phase Separation

Key Features & Benefits

Excellent Mechanical Durability

Exceptional mechanical strength reduces fiber breakage and extends fiber lifespan

Excellent Chemical Durability

Excellent resistance to acids, caustics and oxidants

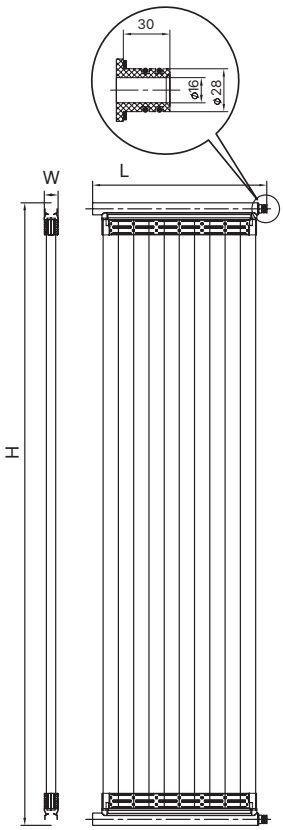
Optimized Module Design

High packing density to reduce system footprint

Dimension Parameters

Membrane Material	PVDF (TIPS)
Nominal Pore Size (µm)	0.04
Housing Material	ABS
Potting Material	Epoxy/Polyurethane
Filtration Surface Area (m^2) [ft^2]	22 [237]
Wet Weight (kg) [lbs]	9 [20]
L* (mm) [inches]	571 [22.5]
W* (mm) [inches]	45 [1.8]
H* (mm) [inches]	1,540 [60.6]
Filtrate Pipe Port (mm) [inches]	DN20 [¾] ABS OD28

*Approximate dimensions. Check with NANOH2O for the most up-to-date and accurate values.



Design and Operating Parameters

Filtration Mode	Outside-in
Typical Flux (LMH) [gfd][1]	8–30 [5–18]
Operating Temperature (°C) [°F]	5–40 [41–104]
Oil Content in Feed Water (ppm)	< 2
pH Range	Operating: 1–12; Cleaning: 1–14
Membrane Tank MLSS (mg/L)[2]	6,000–12,000, Recommended: 6,000–8,000
Air Scour Rate (m^3/hr/module) [cfm/module]	2–3 [1.3–1.9]
Instantaneous Chlorine Tolerance (ppm)	10,000
Maximum Lifetime Chlorine Tolerance (ppm-hrs)	3,000,000
Maximum Transmembrane Pressure (bar) [psi]	0.5 [7]
Maximum Backwash Pressure (bar) [psi]	0.5 [7]
Allowed Particle Size in Feed Water (mm)[3]	≤ 2

1. Flux selection depends on feed type and water quality. Please consult NanoH2O for flux selection.
2. Please consult NanoH2O for deviations. Applicable for MBR application only.
3. The primary concern is sharp objects entering the treatment system such as branches, plastic pieces, sand, etc.

Product Nomenclature

QuantumFlux™ S 15 22

- 22: Module Surface Area
- 15: Module Height
- S: Filtration Mode
  - P: Pressurized
  - S: Submerged

The product performance is expressly conditioned on Buyer's storing, installing, operating, and maintaining Product in accordance with industry-accepted good practices and Seller's written instructions provided in the Seller's Technical Manual may be viewed and downloaded at www.nanoh2owater.com information and data contained herein are deemed to be accurate and reliable and are offered in good faith, but without guarantee of performance. NanoH2O assumes no liability for results obtained or damages incurred through the application of the information contained herein. Customer is responsible for determining whether the products and information presented herein are appropriate for the customer's use and for ensuring that customer's workplace and disposal practices are in compliance with applicable laws and other governmental enactments. Specifications subject to change without notice. QuantumFlux is the Trademark of NanoH2O.
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NSF

This product is certified to NSF/ANSI/CAN 61 for drinking water systems