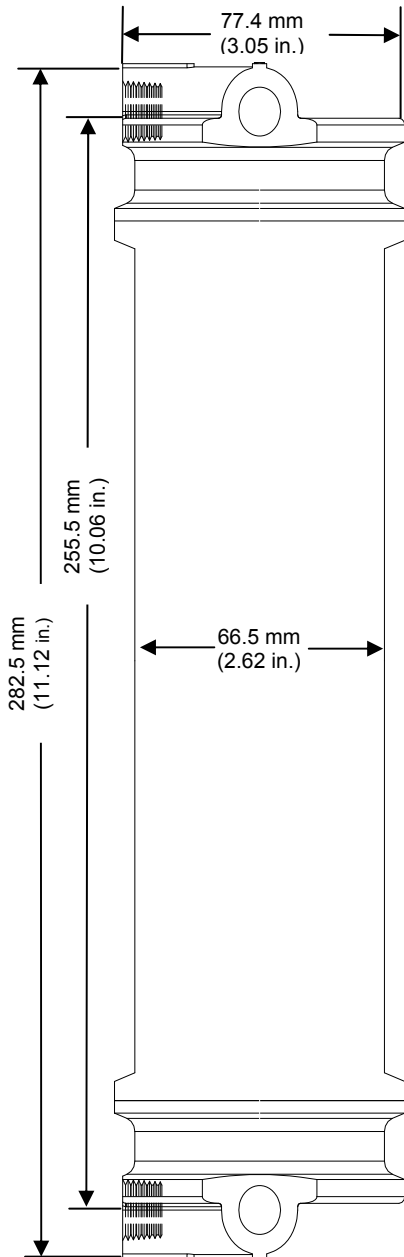
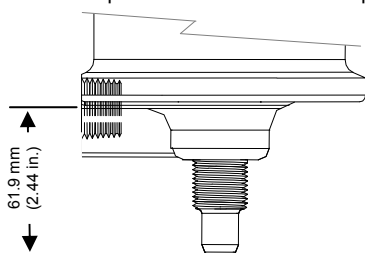


2.5 x 8 EXTRA-FLOW PRODUCT DATA SHEET



Clamp-free Version

Below: End cap with $\frac{3}{8}$ " or $\frac{1}{2}$ " Flaretek liquid ports



Cartridge Characteristics

Cartridge Configuration	Extra-Flow with Center Baffle	
Liquid Flow Guidelines (one cartridge)	0.1 – 0.7 m ³ /hr (0.5 – 3 gpm)	
Membrane Options	X50 Fiber	X40 Fiber
	Recommended for CO ₂ removal from water	Recommended for all other gas transfer applications
Porosity	~ 40%	~ 25%
OD / ID	300 / 220 micron	300 / 200 micron
Membrane/Potting Material	Polypropylene / Polyethylene	
Typical Membrane Surface Area	1.4 m ² (15.1 ft ²)	
Maximum Shellside Working Temperature/Pressure <i>[Using 50 mm vacuum on Lumenside.]</i>	40°C, 7.4 kg/cm ² or 7.2 bar 70°C, 2.1 kg/cm ² or 2.0 bar (104°F, 105 psig) (158°F, 30 psig)	
Maximum Lumenside Liquid Temperature/Pressure w/X40 Fiber	15°-25°C, 4.9 kg/cm ² or 4.8 bar (59°-77°F, 70 psig)	
Priming Volume (approximate)		
Shellside	0.40 liters (0.11 gal.)	
Lumenside	0.15 liters (0.04 gal.)	

Housing Characteristics

Material	Polypropylene
Flange Connections	
Shellside (Liquid Inlet/Outlet)	<ul style="list-style-type: none"> • $\frac{1}{4}$ inch NPT female • $\frac{3}{8}$ inch Flaretek® (nut included) • $\frac{1}{2}$ inch Flaretek® (nut included)
Lumenside	<ul style="list-style-type: none"> • $\frac{1}{4}$ inch NPT female

Seal Options

Material	Applications
K-UPW	Ultra Pure Water
Viton	General Purpose
K-EXT	Chemical Extraction (Clamped version only)

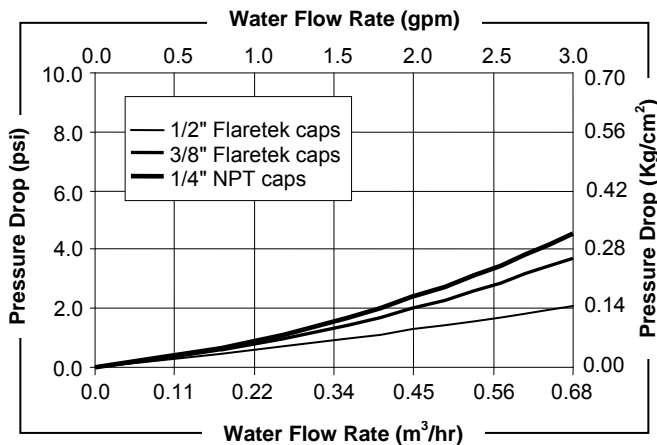
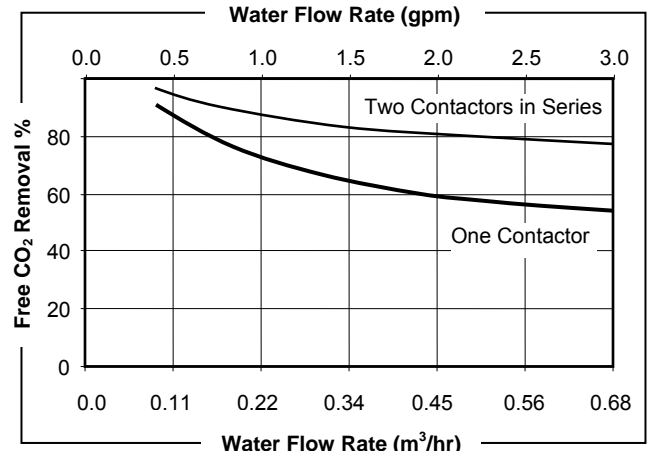
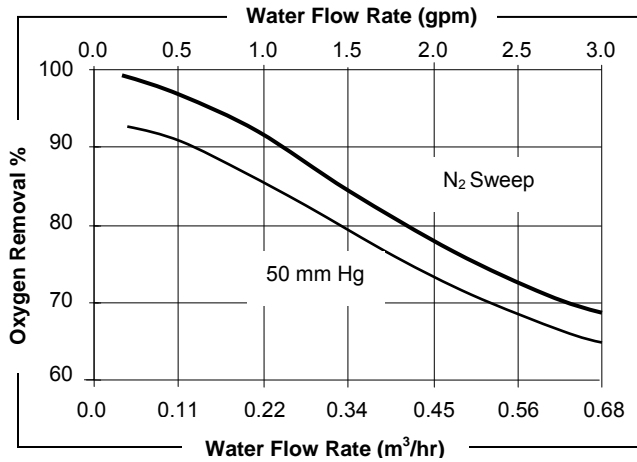
Weight

Dry	0.5 kg. (1.1 lbs.)
Liquid full (shellside)	0.9 kg. (2 lbs.)
Shipping weight	1.2 kg. (2.4 lbs.)

All components of the Liqui-Cel® Extra-Flow Membrane Contactor, when used in accordance with recommendations given in our product literature for treatment or processing of water, alcoholic and non-alcoholic beverages, and aqueous, acid and non-acid food products at and below ambient temperatures, are in compliance with all relevant FDA regulations as specified in Title 21 of the Code of Federal regulations.

Note: Overall length with Flaretek connections increases. See website for all housing drawings.

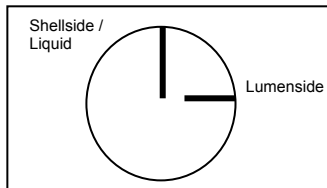
2.5 x 8 PRODUCT DATA SHEET



Test Conditions: Air Sweep Mode, G/L = 3, 25 °C

Cartridge Specifications		
Characteristics	Test Conditions	Specifications
Performance O ₂ Removal	Shellside water flow: 3 gpm, 20°C (68°F) Lumenside N ₂ Flow: 1.0 ft ³ /min, 1.0 atm at 20°C	X50 and X40 64% minimum
Pressure Drop, psi maximum	Shellside water flow: 3 gpm, 20°C	NPT: 6.8 psi 1/2 inch Flaretek [®] : 2.2 psi 3/8 inch Flaretek [®] : 3.9 psi

2.5 x 8 end cap ports for NPT connections



Curves represent nominal values, generated using water at 20°C

Characteristics may change under different operating conditions.

This product is to be used only by persons familiar with its use. It must be maintained within the stated limitations. All sales are subject to Seller's terms and conditions. Purchaser assumes all responsibility for the suitability and fitness for use as well as for the protection of the environment and for health and safety involving this product. Seller reserves the right to modify this document without prior notice. Check with your representative to verify the latest update. To the best of our knowledge the information contained herein is accurate. However, neither Seller nor any of its affiliates assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of the suitability of any material and whether there is any infringement of patents, trademarks, or copyrights is the sole responsibility of the user. Users of any substance should satisfy themselves by independent investigation that the material can be used safely. We may have described certain hazards, but we cannot guarantee that these are the only hazards that exist.

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