

## Supplier Scouting Opportunity 2023-020

**Item to be scouted:** .2 Micron, In-Line Water filter

**Item description:** In-line water filter, typically installed on supply lines to sinks, showers, ice machines, & fountains intended to address point-of-use infection control of legionella outbreaks in healthcare, nursing homes, and other business settings. A 0.2 micron filter delivers water usable for drinking, washing, and possible cleaning of medical instruments.

**NAICS code:** 339112, 332913

### Technical Information

#### Supplier Information

**Type of supplier being sought:** Manufacturer

**Reason for scouting submission:** Price

### Summary of technical specifications and performance requirements

**Describe the manufacturing processes (elaborate to provide as much detail as possible):** Injection molding of filter housing with integral plumbing fittings - PVC, ABS, or Polysulphone  
Filter manufacturing - Polysulphone hollow fiber membrane is most common material

### Provide dimensions / size / tolerances / performance specifications for the item:

Specification:

1. Functional Statement: In-line water filter, typically installed on supply lines to sinks, showers, ice machines, & fountains intended to address point-of-use infection control by delivering water usable for drinking, washing, and possible cleaning of medical instruments.

2. Physical:

2.1. Size: maximum 2.5" diameter x 8.4" long 8.4" (smaller is better) 2.2. Connections: ½" MNPT to accommodate 1/2"x 3/8" FNPT 2.3. Rated inlet pressure: 75 psi (100 psi preferred) 2.4. Rated temperature: 104°F 2.5. Chemical compatibility: 400,000 ppm for 1 hour short-term Chlorine resistance (per IL5) 3. Filter characteristics:

3.1. Flowing media: Water

3.2. Material: Polysulfone hollow fiber membrane (preferred industry standard)

3.3. Pore size: 0.2 micron max

3.4. Flow rate: 2.5 gpm minimum @30 psi (≥5.8 gpm preferred @72psi per IL-5)

3.5. Service Life: Life: 90 day minimum (180 day preferred), disposable end-of-life based on estimated capacity of IL5 @3400 gallons / 180 days ≈ 20 gallons/day

3.6. Bacteria retention: >99.99999% per ASTM F838 4. Packaging:

4.1. Individually heat sealed, sterile, clear/viewable pack 5. Regulatory:

5.1. NSF/ANSI 61 certified materials for use in drinking water 5.2. FDA approval (510k cleared) preferred, but not required by the CDC who requires a 0.2 micron

**List required materials needed to make the product, including materials of product components:**  
PVC, ABS, or Polysulphone filter housing, Polysulphone hollow fiber membrane filter

**Are there applicable certification requirements?:** NSF/ANSI 61 certified materials for use in drinking water

**Are there applicable regulations?:** FDA approval (510k cleared) preferred, but not required by the CDC who requires a 0.2 micron

**Are there any other standards, requirements, etc.?:** No

## **Business Information**

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### **Volume and pricing**

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#### **Estimated potential business volume:**

Customer supply need:

1) Quantity:

- a) Annual volume: 10,000 units
- b) Minimum stock on hand: 1200 units at manufacturer
- c) Minimum purchase quantity: 25 units

2) Lead time:

- a) Delivery of stock on hand: 1 day
- b) Manufacture lead time (from out-of-stock): 7 days

**Estimated target price / unit cost information (if unavailable explain):** Competitive quote

### **Delivery requirements**

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**When is it needed by?:** Long term to replace existing overseas supply (1 year)

**Describe packaging requirements:** Individually heat sealed, sterile, clear/viewable pack

**Where will this item be shipped?:** Dayton, OH

## **Additional Information**

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### **Photos or diagrams of the item**

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**Check if you uploaded file(s) to Box.com:** Yes

**Agree (click to read agreement):** Yes

## IN-LINE WATER FILTER

**Product Value Proposition:** In-line, point-of-use water filters can be used for rapid infection control of legionella outbreaks in healthcare, nursing homes, and other business settings. Unfortunately, there is a limited source of approved filter suppliers, with the majority manufactured overseas and sold at a premium price point. A lower cost, U.S. manufactured, in-line water filter with competitive performance to benchmarked products would have immediate impact in the U.S. market.

### Product Benchmark:

<b>Supplier:</b>	Nephros	AquaMedix
<b>Model:</b>	SSU-H 	In-line IL5 
<b>Part Number:</b>	70-0284	49406
<b>Dimensions:</b>	7" L x 2.5" D	6.0"L x 2.4" D
<b>Connection:</b>	½" male pipe	
<b>Replacement life:</b>	90 days (typical sink)	180 days
<b>Estimated capacity:</b>	-	3,400 gallons
<b>Housing material:</b>	Polysulfone	ABS
<b>Membrane material:</b>	Medisulfone©	Polysulfone hollow fibers
<b>Filter pore size:</b>	.005 $\mu m$	0.2 $\mu m$
<b>Bacterial Retention:</b>	>99.99999% per ASTM F838-05	
<b>Max inlet pressure:</b>	75 psi	
<b>Max temperature:</b>	-	104°F
<b>Flow rate:</b>	2.5 gpm @30 psi	5.8 gpm @ 72psi
<b>Regulatory:</b>	FDA 510k cleared, class 2 medical device to aid in infection control	FDA Medical class 1 medical device approval

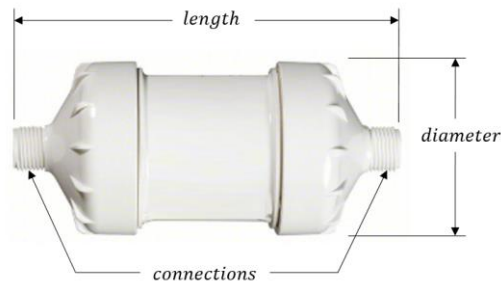
### Supply need for our client:

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  - b) Minimum stock on hand: 1200 units at manufacturer
  - c) Minimum purchase quantity: 25 units
- 2) Lead time:
  - a) Delivery of stock on hand: 1 day
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**Specification:**

**Date:** 2023-Feb-01

**Revision:** 1



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