## 3M ${ }^{\text {" }}$ Water Filtration Products

SPEC\# $\qquad$ application:

## WAREWASHING EQUIPMENT

## models:

## HWS050 \& HWS100

The $3 \mathrm{M}^{\mathrm{TM}}$ Water Filtration Products HWS Series of warewashing water softener systems are designed to reduce spotting on dishes, glasses and flatware, as well as reduce scale build-up on dishwasher spray nozzles and compartments. A high capacity, high temperature resistant resin provides the ability to remove calcium and magnesium minerals that cause white spots on dishware. This "softened" water also reduces hard scale build-up on dish machine walls and nozzles, which can reduce performance and equipment life. Softened water also allows detergents to work more efficiently, reducing excess chemical consumption.

## PRODUCT BENEFITS

- Space saving design allows unit to fit directly under dishwasher table for convenient storage.
- Corrosion resistant vinylester resin tank offers reduced deterioration and long term performance for temperatures up to $150^{\circ} \mathrm{F}\left(65.6^{\circ} \mathrm{C}\right)$.
- Safety brine valve ensures overflow prevention in the event of a power outage.
- 12 day timer controlled regeneration allows system to clean and regenerate automatically without daily monitoring or interruption of service.
- $3 / 4$ " 316 SS bypass with FIP connections as standard.
- 115 VAC to 24 VAC transformer is energy efficient.


## PRODUCT SPECIFICATIONS

| Model <br> Number | Part <br> Number | Style | Capacity | System Flow Rate | Application |
| :---: | :---: | :---: | :---: | :---: | :---: |
| HWS050 | HWS050 | Vinylester Tank 3/4" FIP Connections <br> 115 VAC to 24 VAC transformer | 16,000 grains per tank | $5 \mathrm{gpm}(18.9 \mathrm{lpm})$ |  |
|  |  |  | $8.5 \mathrm{gpm}(32.2 \mathrm{lpm})$ | $150^{\circ} \mathrm{F}\left(65.6^{\circ} \mathrm{C}\right)$ water, maximum |  |
| HWS100 | HWS100 |  |  |  |  |

SPEC\# $\qquad$
QUANTITY $\qquad$
MODEL NUMBER $\qquad$
PART NUMBER $\qquad$

© WARNING: To reduce the risk associated with the ingestion of contaminants:

- Do not use with water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.

CUNO Incorporated recommends regularly scheduled maintenance and replacement of the filter cartridge(s) in order for the product to perform as advertised/sold. CUNO shall not be liable for system failures due to improper maintenance.

## PHYSICAL SPECIFICATIONS

System:

- 3/4" female NPT connections.
- Maximum operating pressure of $100 \mathrm{psi}(689 \mathrm{kPa})$ and operating temperature of $100^{\circ} \mathrm{F}\left(37.8^{\circ} \mathrm{C}\right)$.
- 16,000 grain capacity at $5 \mathrm{gpm}(18.9 \mathrm{lpm})$ service flow rate for HWS050.
- 32,000 grain capacity at $8.5 \mathrm{gpm}(32.2 \mathrm{lpm})$ service flow rate for HWS100.


## Control Valve:

- Lead free brass, 5 cycle.
- Timer controlled.
- 3/4" 316SS bypass, FIP.
- 115 VAC to 24 VAC transformer.


## Resin Tank:

- Vinylester.
- Heat resistant, high capacity ion exchange.

Brine Tank:

- High density polyethylene.
- Includes brass safety valve.
- Holds up to 230 lbs . ( 104.3 kg ) of salt.
- Salt support shelf.


## IMPORTANT: INSTALLATION TIPS

These installation tips are for informational purposes only and are not intended to be used as actual installation instructions. CAUTION: To reduce the risk associated with property damage due to water leakage:

- Read and follow Use Instructions before installation and use of this system.
- Installation and use MUST comply with all state and local plumbing codes.
- Protect from freezing, remove system when temperatures are expected to drop below $40^{\circ} \mathrm{F}\left(4.4^{\circ} \mathrm{C}\right)$.
- Do not install on hot water supply lines. The maximum operating water temperature of this filter system is $100^{\circ} \mathrm{F}\left(37.8^{\circ} \mathrm{C}\right)$.
- Do not install if water pressure exceeds $100 \mathrm{psi}(689 \mathrm{kPa})$. If your water pressure exceeds $80 \mathrm{psi}(552 \mathrm{kPa})$, you must install a pressure limiting valve. Contact a plumbing professional if you are uncertain how to check your water pressure.
- Do not install where water hammer conditions may occur. If water hammer conditions exist you must install a water hammer arrester. Contact a plumbing professional if you are uncertain how to check for this condition.

