

Data Sheet—

# Series 100

## Reverse Osmosis Controller



### **Key Features**

- Visual status LED
- TDS monitor w/ sensor (range 0-1000 PPM)
- Three-digit LED display
- Jumper-selectable flush type
- Jumper-selectable switch inputs
- TDS calibration and setpoint adjustment
- Quick disconnect high voltage terminals
- Panel mountable enclosure

## Application

The Advantage Controls Series 100 Microprocessor Controller is an ideal solution for the monitoring and control of light commercial reverse osmosis units. This economical controller provides relays for the RO pump, inlet solenoid valve, and membrane flush solenoid valve.

The dry contact switch inputs monitor storage tank level, low and high pressure switch signal, and system lockout for pretreatment backwash or regeneration for on/off operation. All inputs and outputs are controlled with time delays for proper operation.

Additionally, the TDS value incorporates a fieldadjustable setpoint for water quality threshold, allowing the unit to produce a system warning if the water quality threshold is exceeded.



### **Build a Model**

#### **Base Control Selection -**

**S100** = Inlet solenoid, flush, pressure switch, and TDS

Model

#### **Controller Supply Voltage -**

- **1** = 120 VAC
- **2** = 220 VAC

#### Enclosure –

- $A = 8.25^{\circ} \times 5^{\circ} \times 3^{\circ}$
- $\mathbf{B} = 8" \times 6" \times 4"$  poly
- $X = 10" \times 8" \times 6"$  poly
- **4** = 12"×10"×6" poly
- **9** = Enclosure defined in Motor Control model number, or no enclosure

### **Specifications**

#### Power

120 VAC or 240 VAC - 15+10%, 50/60Hz

#### Enclosure

8.25"x5"x3" ABS plastic

#### Accuracy ± 2%

#### Environment

-22°F (-30°C) to 140°F (60°C), 0-95%RH, Non-condensing

#### Display

3-digit red LED

#### **Conductivity Scale**

0-1,000 PPM

#### Front Panel

Overlay with LED window, status LED, water quality LED, power and setpoint switches

#### Switch Inputs, Dry Contact:

- Pressure fault
- Pretreat lockout
- Tank full

#### **Relay Outputs**

- Inlet solenoid valve relay: 120/240 VAC 5 amp maximum
- **RO pump relay:** 120/240 VAC 1HP, single phase maximum
- Flush solenoid valve relay: 120/240 VAC 5 amp maximum

Relays supply same output voltage as board power (120 or 240 VAC) 20A maximum total load for all outputs.