



EXTROL®

EXPANSION TANKS FOR HYDRONIC HEATING & CHILLED WATER SYSTEMS INSTALLATION & OPERATION INSTRUCTIONS

Models EX-15 through EX-90 Models SX-30V through SX-160V



NOTE: Inspect for shipping damage. Notify freight carrier or store where purchased immediately if damage is present. To avoid risk of personal injury and property damage, if the product appears to be malfunctioning or shows signs of corrosion, call a qualified professional immediately. Current copies of the product manual can be viewed at www.amtrol.com. Use proper safety equipment when installing.



THIS IS THE SAFETY ALERT SYMBOL. IT IS USED TO ALERT YOU TO POTENTIAL PERSONAL INJURY AND OTHER HAZARDS. OBEY ALL SAFETY MESSAGES THAT FOLLOW THIS SYMBOL TO REDUCE THE RISK OF PERSONAL INJURY AS WELL AS PROPERTY DAMAGE.

WARNING **USE ONLY IN RESIDENTIAL CLOSED HYDRONIC SYSTEMS.** Do not install on domestic water systems, or in open heating systems. Corrosion and tank failure may result. Use a Therm-X-Trol® or Therm-X-Span® for domestic water systems. Use a Radiant EXTROL® for radiant heating systems where air elimination equipment or barrier tubing is not used.

WARNING **READ CAREFULLY THE PRODUCT INSTALLATION, OPERATING AND MAINTENANCE MANUAL. FAILURE TO FOLLOW THE INSTRUCTIONS AND WARNINGS IN THE MANUAL MAY RESULT IN SERIOUS OR FATAL INJURY AND/OR PROPERTY DAMAGE, AND WILL VOID THE PRODUCT WARRANTY. THIS PRODUCT MUST BE INSTALLED BY A LICENSED PROFESSIONAL. FOLLOW ALL APPLICABLE LOCAL AND STATE CODES AND REGULATIONS, IN THE ABSENCE OF SUCH CODES, FOLLOW THE CURRENT EDITIONS OF THE NATIONAL PLUMBING CODE AND NATIONAL ELECTRIC CODE, AS APPLICABLE.**

WARNING This Product, like most Products under pressure, may over time corrode, weaken and burst or explode, causing serious or fatal injury, leaking or flooding and/or property damage. To minimize risk, a licensed professional must install and periodically inspect and service the Product. A drip pan connected to an adequate drain must be installed if leaking or flooding could cause property damage. Do not locate in an area where leaking could cause property damage to the area adjacent to the appliance or to lower floors of the structure.

WARNING **RUPTURE OR EXPLOSION HAZARD.** Do not expose product to freezing temperatures or

temperatures in excess of 240°F. Do not adjust the pre-charge or re-charge this Product except during installation or regular inspection. Replace the Product and do not adjust the pre-charge if corroded, damaged or with diminished integrity. Adjustments to pre-charge must be done at ambient temperature only. Failure to properly size the Product or follow these instructions may result in excessive strain on the system and may lead to Product failure, serious or fatal personal injury, leakage, and/or property damage.

WARNING A relief valve must be installed to prevent pressure in excess of local code requirement or maximum working pressure designated in the Product Manual, whichever is less. At least once every 3 years or if discharge is present, a licensed professional should inspect the pressure relief valve and replace if corrosion is evident or the valve does not function. **FAILURE TO INSPECT THIS VALVE AS DIRECTED COULD RESULT IN UNSAFE PRESSURE BUILD-UP WHICH CAN RESULT IN PRODUCT FAILURE, SERIOUS INJURY OR DEATH AND/OR SEVERE PROPERTY DAMAGE AND VOID THE PRODUCT WARRANTY.**

WARNING **Chlorine & Aggressive Water:** The water quality can significantly influence the life of this Product. You should test for corrosive elements, acidity, total solids and other relevant contaminants, including chlorine and treat your water appropriately to insure satisfactory performance and prevent premature failure.

WARNING This product can expose you to chemicals including lead, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov.

**PLEASE READ THE FOLLOWING INSTRUCTIONS CAREFULLY FOR
IMPORTANT GENERAL SAFETY INFORMATION AND ADDITIONAL SPECIFIC SAFETY ALERTS.
VISIT www.amtrol.com TO VIEW HELPFUL VIDEOS.**

Pre-Installation

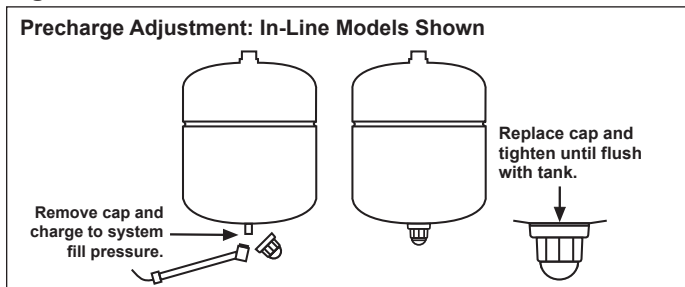
1. Visually inspect for any damage. Ensure expansion tank is sized properly for the application (Figure 1).
2. With tank empty of water, remove plastic cap from air stem (Figure 2).
3. Check precharge pressure and adjust if necessary, charging with air to match boiler fill valve setting.
4. Replace cap and tighten snugly, ensuring the cap is flush against the tank surface.

Figure 1.

| Boiler Net Output in 1000'S of BTU/Hr. | Type of Radiation | | | |
|--|--|----------------------------|---------------------|---------------------|
| | Finned Tube Baseboard or Radiant Panel | Convectors or Unit Heaters | Radiators Cast Iron | Baseboard Cast Iron |
| 25 | EX-15 | EX-15 | EX-15 | EX-15 |
| 50 | EX-15 | EX-15 | EX-30 | EX-30 |
| 75 | EX-30 | EX-30 | EX-30 | EX-60 |
| 100 | EX-30 | EX-30 | EX-60 | EX-60 |
| 125 | EX-30 | EX-60 | EX-60 | EX-90 |
| 150 | EX-30 | EX-60 | EX-90 | EX-90 |
| 175 | EX-60 | EX-60 | EX-90 | EX-90 |
| 200 | EX-60 | EX-60 | EX-90 | EX-90 |
| 250 | EX-60 | EX-90 | EX-90 | EX-90 |
| 300 | EX-90 | SX-30V | SX-30V | SX-40V |
| 350 | SX-30V | SX-30V | SX-40V | SX-60V |
| 400 | SX-30V | SX-40V | SX-40V | SX-60V |
| 450 | SX-40V | SX-40V | SX-60V | SX-90V |
| 500 | SX-40V | SX-40V | SX-60V | SX-90V |
| 550 | SX-40V | SX-60V | SX-60V | SX-90V |
| 600 | SX-40V | SX-60V | SX-90V | SX-90V |
| 650 | SX-60V | SX-60V | SX-90V | SX-90V |
| 700 | SX-60V | SX-60V | SX-90V | SX-90V |
| 750 | SX-60V | SX-60V | SX-90V | SX-110V |
| 800 | SX-60V | SX-90V | SX-90V | SX-110V |
| 850 | SX-60V | SX-90V | SX-90V | SX-110V |
| 900 | SX-60V | SX-90V | SX-110V | SX-110V |
| 950 | SX-90V | SX-90V | SX-110V | SX-110V |
| 1,000 | SX-90V | SX-90V | SX-110V | SX-110V |
| 1,100 | SX-90V | SX-90V | SX-110V | SX-130V |
| 1,200 | SX-90V | SX-90V | SX-110V | SX-130V |
| 1,300 | SX-90V | SX-110V | SX-130V | SX-160V |
| 1,400 | SX-110V | SX-130V | SX-160V | SX-160V |
| 1,500 | SX-110V | SX-130V | SX-160V | (2)SX-110V |

Sizing based on: 12 psig Fill; 30 psig Relief Valve; 200°F Average Temperature.

Figure 2.



WARNING FAILURE TO PROPERLY SEAL CAP WILL RESULT IN LOSS OF PRECHARGE CAUSING PRODUCT TO FAIL.

WARNING Mount tank vertically in downward position only. Ensure the piping can support the entire weight of the tank when full of water.

WARNING Models SX-30V through SX-160V are floor standing and may not be hung from the piping.

WARNING Do not install the EXTROL on a dead-end pipe or wherever air can collect. This can cause corrosion and possible leakage.



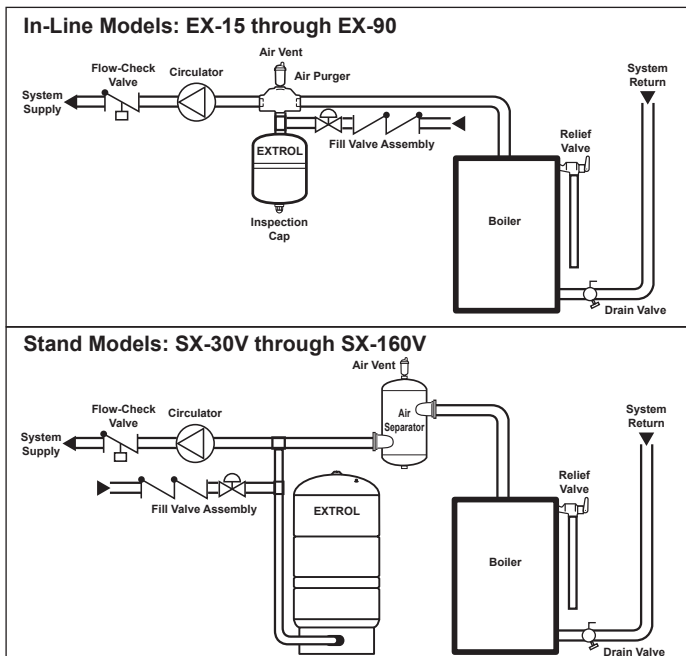
1400 Division Road, West Warwick, RI USA 02893
T: 800.426.8765 www.amtrol.com

© 2019 Worthington Industries Inc.
One or more features of this product are covered by U.S. patents, visit www.amtrol.com/patents for more information.

Installation

1. Drain the boiler system or isolate the area where the EXTROL will be installed.
2. Install the EXTROL on the supply side of the boiler, on the suction-side of the heating circulator(s) (Figure 3).
3. Pressurize the system and check for leaks. Repair as necessary.
4. Restart the boiler system and check for relief valve discharge. If the relief valve drips, the tank may be improperly charged or undersized.

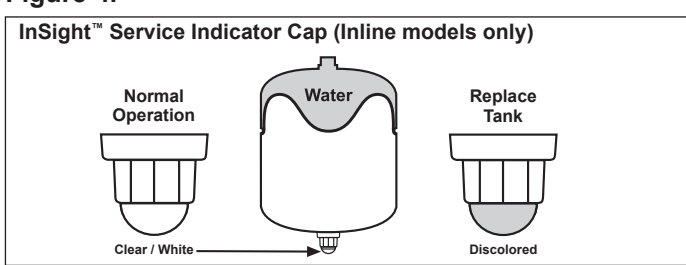
Figure 3.



Maintenance

A professional plumber should check the complete system, including the expansion tank, yearly and more frequently as the system ages. Checking the precharge allows a small quantity of air to escape and can result in an insufficient air charge. Always check the precharge while the tank is isolated and empty of water, and be sure to maintain the proper precharge whenever the tank is inspected. Monitor the tip of the inspection cap for discoloration (Figure 4) in addition to regular product inspection. Contact the installer or a plumbing professional if inspection cap is discolored; tank replacement required. Do not rely on cap as sole indication of tank condition.

Figure 4.



Warranty

EX Models: Five (7) Year Limited Warranty
SX Models: One (1) Year Limited Warranty
Visit www.amtrol.com for complete warranty details.



Part #: 9015-941 (01/19)