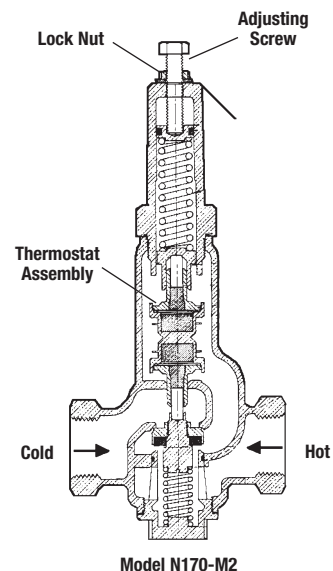
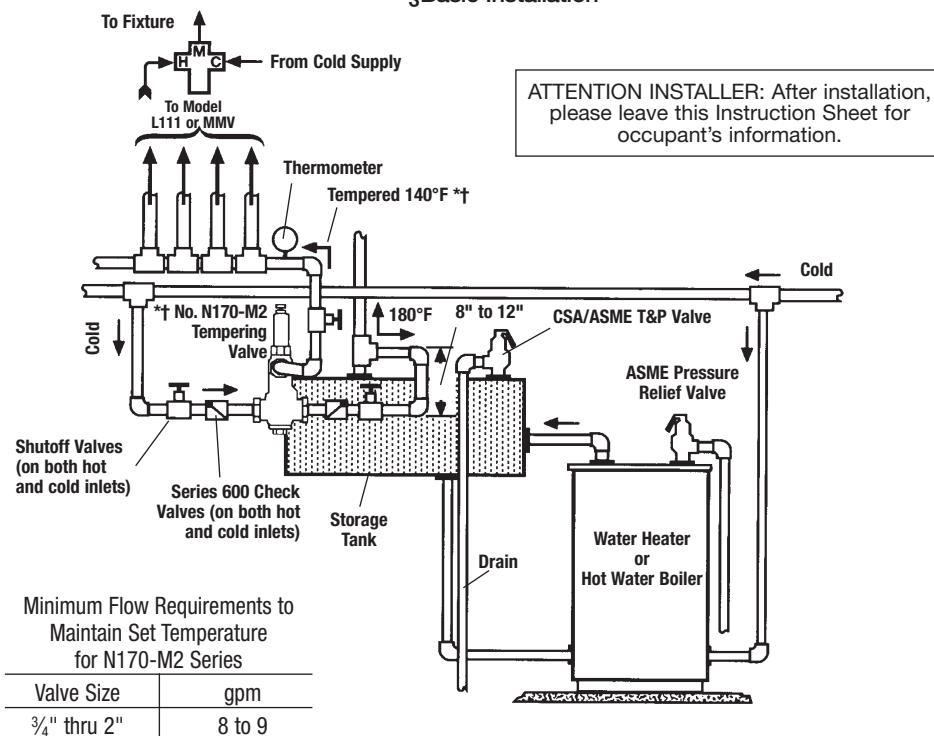


Series N170-M2

Hot Water Extender Tempering Valves

§ Basic Installation



Installation Instructions

The installation drawing above shows the correct method of installing the Series N170-M2 Hot Water Extender Tempering Valves. **IMPORTANT: Valve must be trapped as shown.** Valve should never be placed in an area in which the ambient temperature is higher than the mixed water setting.

§ For two temperature installation see reverse side.

Start Up Requirements

The cold water supply line to tempering valve should always be opened first to prevent possible thermostat damage.

To change the temperature of the water, loosen the Lock Nut to free the Adjusting Screw. Turn clockwise to attain cooler water and counterclockwise to attain hotter water. A full turn of the Adjusting Screw is equal to approximately 10°F. Watts recommends that a temperature gauge be installed on the tempered line and be checked at least monthly under normal flow conditions. The gauge may be installed in the tempered line at least 6 ft. away from the tempering valve.

- The adjustment temperature range for Model N170-M2 is 130°F – 180°F.
- For proper operation do not exceed 210°F inlet temperature.
- Valve should be installed by a licensed contractor.

Model N170L-M2

NOTE: For lower tempered water at or below 130°F, use low temperature Model N170L-M2 which provides water at a temperature range between 100°F – 130°F.

*WARNING:

Watts Hot Water Extender Tempering Valves cannot be used for tempering water temperature at fixtures. Severe bodily injury (i.e., scalding or chilling) and/or death may result depending upon system water pressure changes and/or supply water temperature changes. ASSE standard 1016 listed devices such as Watts Series MMV and L111 valves should be used at fixtures to prevent possible injury.

The Watts Hot Water Tempering Valves are designed to be installed at or near the boiler or water heater. They are not designed to compensate for system pressure and/or temperature fluctuations and should not be used where ASSE standard 1016 devices are required. These Watts valves should never be used to provide "anti-scald" or "anti-chill" service. Only the N170L (low temperature) model may be used in a radiant heat application; other models of this valve must not be used in radiant heat applications. When installing the N170L valve in a radiant heat application, the components of the radiant heat system must be of materials with a construction capable of withstanding the high limit output temperatures of the heating boiler. If you are uncertain as to the product's adaptability for your application, please consult an authorized representative before installing or using the product.



CAUTION. Need for Periodic Inspection: Periodic inspection by a licensed contractor is recommended. Corrosive water conditions, temperatures over 210°F, unauthorized adjustments or repair could render the valve ineffective for service intended. Regular checking and cleaning of thermostat assembly helps to assure maximum life and proper product function. Frequency of cleaning depends upon local water conditions.

* Heat trap is recommended.

† Valves listed to ASSE Standard 1016 such as the Watts L111, USG or MMV should be used at point of delivery.

Series N170-M2 Hot Water Extender Tempering Valves

Installation Instructions for A Two Temperature Recirculating Hot Water Supply System

IMPORTANT: Valve must be installed trapped as shown. (See reverse side for recommended minimum gpm flow requirements.)

The sketch illustrates a two-temperature (180°F and 140°F) hot water supply system with a Series N170-M2 valve and recirculating line for maintaining approximate fixture water temperatures in the mains. Because very little hot water is required to maintain the low temperature in the mains (usually 140°F), a relatively small capacity recirculator can generally be specified. The minimum flow requirements must be maintained between 8 and 9 gpm. Providing the heat loss from the piping is not too great (long runs of hot water piping should be insulated) standard circulators are usually adequate. However, each installation should be evaluated for its own recirculation requirements of gpm and pipe resistance.

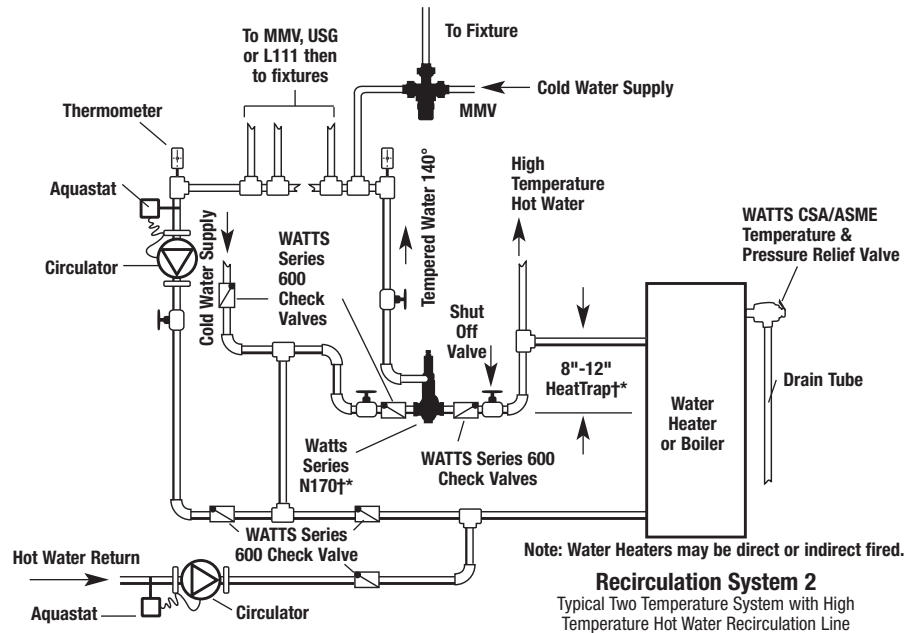
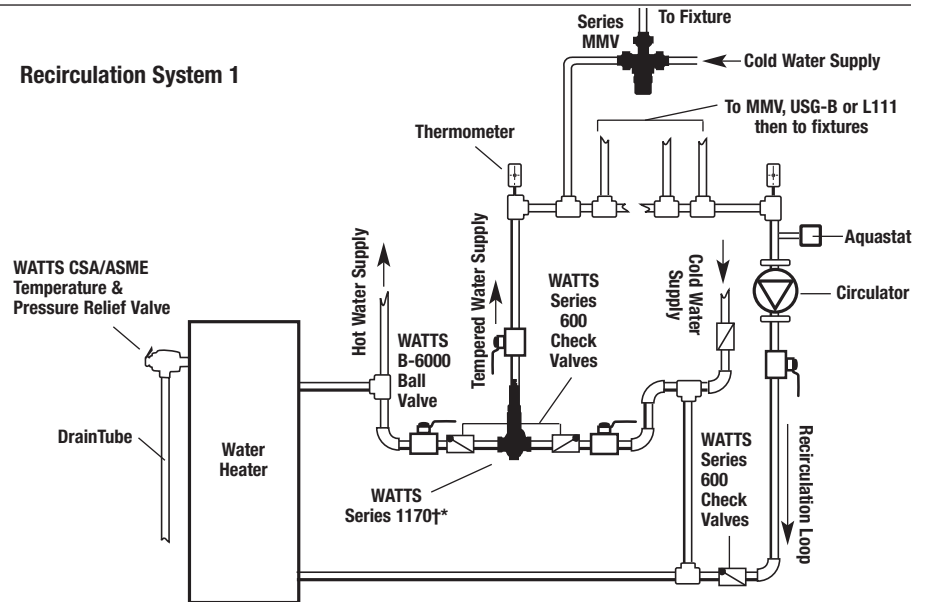
*See warning on reverse side.

**NOTE: Recirculating control aquastat must be set at least 5°F to 10°F lower than the temperature setting of the Series N170-M2 valve, otherwise the recirculator will run continually. Aquastat must be used to maintain water to fixtures at a desired temperature and to eliminate temperature override during no draw periods.

† Valves listed to ASSE Standard 1016 such as the Watts L111, USG or MMV should be used at point of delivery.

* Heat trap is recommended.

Recirculation System 1



CALIFORNIA PROPOSITION 65 WARNING
WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm. (California law requires this warning to be given to customers in the State of California.)
 For more information: www.watts.com/prop65

Limited Warranty: Watts Regulator Co. (the "Company") warrants each product to be free from defects in material and workmanship under normal usage for a period of one year from the date of original shipment. In the event of such defects within the warranty period, the Company will, at its option, replace or recondition the product without charge. **THE WARRANTY SET FORTH HEREIN IS GIVEN EXPRESSLY AND IS THE ONLY WARRANTY GIVEN BY THE COMPANY WITH RESPECT TO THE PRODUCT. THE COMPANY MAKES NO OTHER WARRANTIES, EXPRESS OR IMPLIED. THE COMPANY HEREBY SPECIFICALLY DISCLAIMS ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.** The remedy described in the first paragraph of this warranty shall constitute the sole and exclusive remedy for breach of warranty, and the Company shall not be responsible for any incidental, special or consequential damages, including without limitation, lost profits or the cost of repairing or replacing other property which is damaged if this product does not work properly, other costs resulting from labor charges, delays, vandalism, negligence, fouling caused by foreign material, damage from adverse water conditions, chemical, or any other circumstances over which the Company has no control. This warranty shall be invalidated by any abuse, misuse, misapplication, improper installation or improper maintenance or alteration of the product. Some States do not allow limitations on how long an implied warranty lasts, and some States do not allow the exclusion or limitation of incidental or consequential damages. Therefore the above limitations may not apply to you. This Limited Warranty gives you specific legal rights, and you may have other rights that vary from State to State. You should consult applicable state laws to determine your rights. **SO FAR AS IS CONSISTENT WITH APPLICABLE STATE LAW, ANY IMPLIED WARRANTIES THAT MAY NOT BE DISCLAIMED, INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ARE LIMITED IN DURATION TO ONE YEAR FROM THE DATE OF ORIGINAL SHIPMENT.**