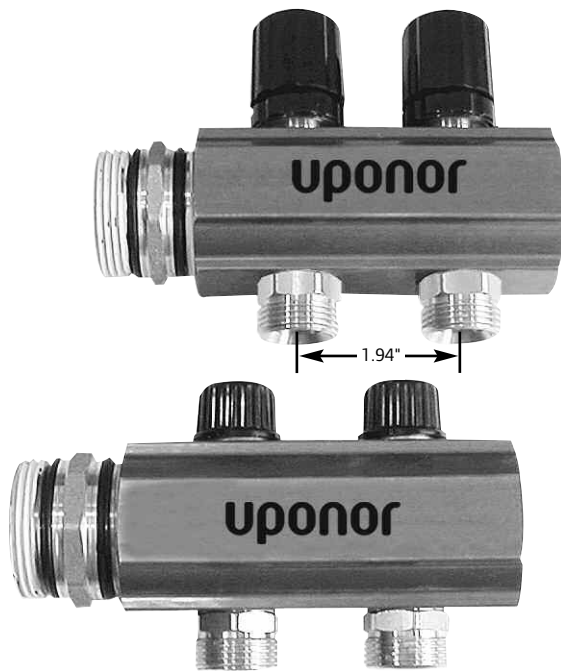


# Uponor

RADIANT HEATING SYSTEMS

## TRUFLOW™ CLASSIC MANIFOLD EXTENSION KIT

INSTRUCTION SHEET



### Introduction

The TruFLOW™ Classic Manifold Extension Kit (A2610100) allows easy inline extension of up to two additional loops for the TruFLOW Classic Manifold. The kit contains two 1/4" BSP nipples, one supply manifold, one return manifold and two loop end caps. Use Uponor Silicone Oil (included in the kit) on the male threads to ease installation.

### Manifold Specifications

Maximum Working Pressure: 145 psi  
Maximum Fluid Temperature: 220°F  
(104°C)

### Assembly Instructions

1. Remove the end cap with vent and drain from the manifold body. (See **Figure 1**.)
2. Apply the Uponor Silicone Oil (included in the kit) on the union thread over the factory-applied Teflon thread sealer. (See **Figure 2**.)
3. Spin the extension kit body into the manifold body until the o-ring disappears. There is now one full turn left to orient the extension kit body so it lines up with the manifold. (See **Figure 3**.)
4. Use the procedure in steps 2 and 3 for the end cap with vent and drain.

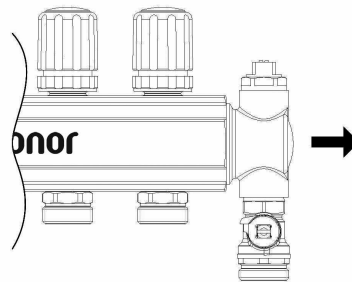


Figure 1

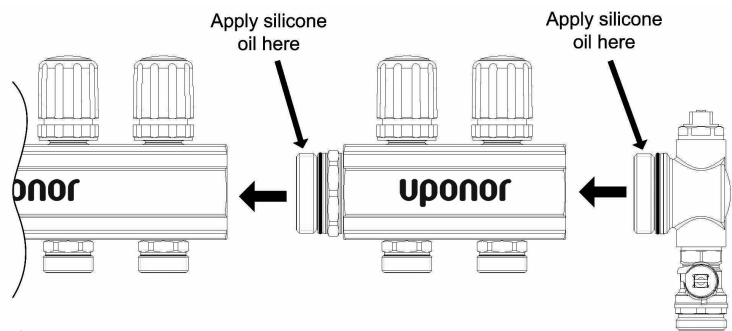


Figure 2

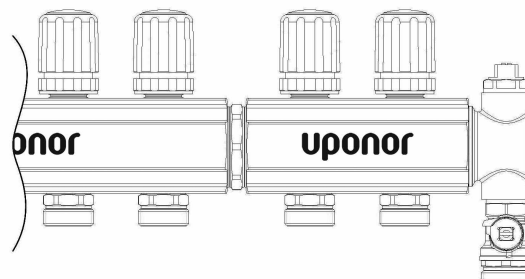


Figure 3

## How to Determine Balancing Turns

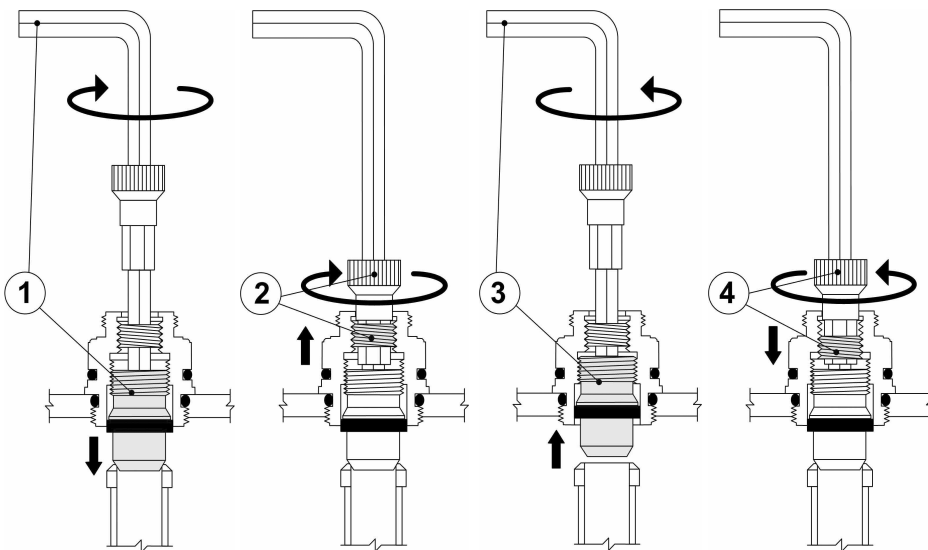
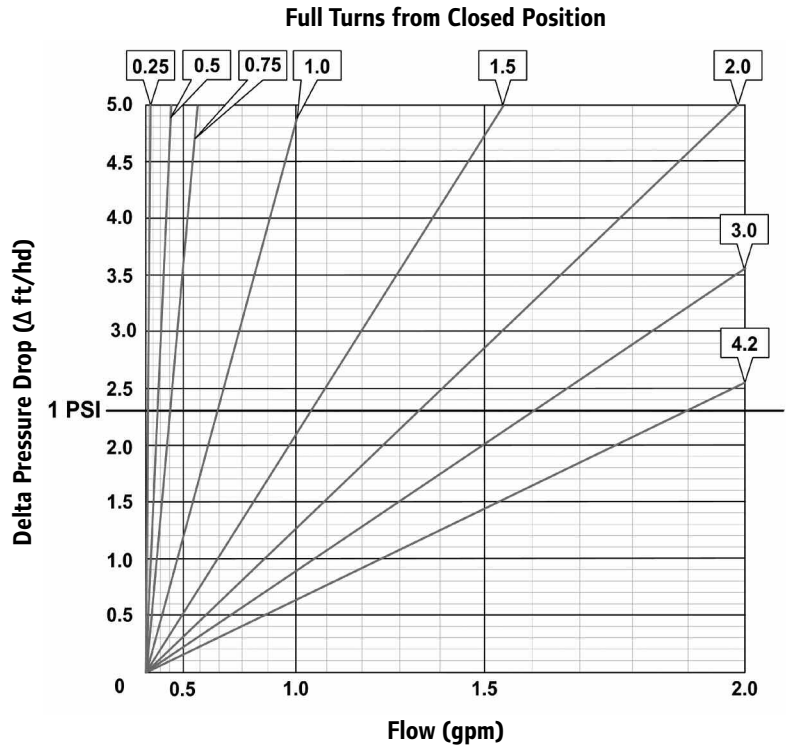
To balance the manifold correctly, determine the flow (gpm) and pressure drop (ft/hd) for each loop on the manifold. To find the required turns, follow directions below:

1. On the manifold to be balanced, find the loop with the highest pressure drop (ft/hd). This loop does not need any balancing, and will be fully open (4.25 turns from closed position).
2. To balance all other loops on the manifold, find the pressure drop (ft/hd) for each loop and subtract from the loop with the highest pressure drop (same as the loop figured in step 1). The difference is the delta ft/hd. Use this number on the balancing chart to find the required number of balancing turns.

**Example:** If the highest pressure-drop loop has 7 ft/hd and the loop that needs to be balanced has 5 ft/hd. Subtract 5 from 7 for a difference of 2 delta ft/hd.

3. Locate the delta ft/hd number on the vertical scale located on the left side of the balancing chart.
4. Locate the gallons per minute (gpm) on the horizontal scale at the bottom of the balancing chart.
5. Locate where the delta ft/hd and gpm intersect on the chart.
6. The closest diagonal line to this intersection represents the number of full valve turns from closed to open to accurately balance the loop. If the intersection falls between two diagonal lines, estimate the distance between the lines and adjust the turns accordingly.

## Balancing Chart



## Valve Setting

To balance and preset the manifold assembly, proceed as follows.

1. Using the chrome allen key (6mm), turn main valve clockwise until it stops.
2. Using the small brass key, turn memory stop clockwise until it stops.
3. Using the chrome allen key, turn the main valve counter-clockwise to set the loop flow or balancing turns for that loop.
4. Using the small brass key, turn memory stop counter-clockwise until it stops.

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