# For Hot Water Heating Applications

Job Name	Contractor
Job Location	Approval
Engineer	Contractor's P.O. No.
Approval	Representative

# Series AS-MB Microbubble Air Separator

Sizes: 3/4" - 2" Threaded 3/4" - 11/4" Solder 11/4" Flanged

Series AS-MB Microbubble Air Separator is designed for efficient separation and elimination of entrained air in hydronic heating systems. Offered in sizes <sup>3</sup>/<sub>4</sub>" - 2" Threaded, and <sup>3</sup>/<sub>4</sub>" - 1<sup>1</sup>/<sub>4</sub>" Solder, and 1<sup>1</sup>/<sub>4</sub>" Flanged.

### **Features**

Durable forged brass body construction. Series AS-MB does not require laminar flow for efficient separation and elimination of entrained air in hydronic heating systems. There is no minimum inlet/outlet piping length required for proper operation of AS-MB Microbubble Air Separators.

Rugged, polyphenylsulfone (PPSU) coalescing media withstands petroleum based cleaners, glycol anti-freeze and temperatures up to 240° degrees in closed-loop heating systems, and methanol based anti-freeze solutions in ground source heat pump loops.

DuoVent air vent assembly consists of a brass cover, air vent with silicone rubber seal, shutter, polyethylene float with valve plug, automatic vent with black cap and manual vent with red cap. Air vent assembly has a high capacity and high temperature rating and is ideal for use with glycol systems or for use as an anti-vacuum device.

Fully serviceable - can be disassembled for inspection and cleaning.

½" FPT bottom tapping for use with Series RBFF Residential Boiler Fill Fitting

AS-MB FL flanged model can be used with Series PIPF Isolation Pump Flanges with Purge Port & Swivel Flange to create a compact system purge/air elimination module.

## **Specifications**

A microbubble air separator shall be installed as indicated on the plans. Separator shall be of forged brass construction with serviceable/replaceable coalescing media and air vent assembly and include a tapping for connection of boiler fill valve and expansion tank. Separator shall be a Watts Series AS-MB.

Cv ratings		
3/4" C <sub>v</sub> = 10.2 GPM		
1" C <sub>v</sub> = 15.0 GPM		
11/4" (thread, solder and flange) C <sub>v</sub> = 23.1 GPM		
$1\frac{1}{2}$ " (thread) $C_v = 25.0$ GPM		
$2''$ (thread) $C_V = 37.5$ GPM		



AS-MB-THREADED



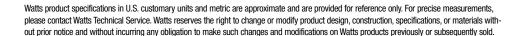
AS-MB-FLANGED



AS-MB-SWEAT

#### NOTICE

The information contained herein is not intended to replace the full product installation and safety information available or the experience of a trained product installer. You are required to thoroughly read all installation instructions and product safety information before beginning the installation of this product.



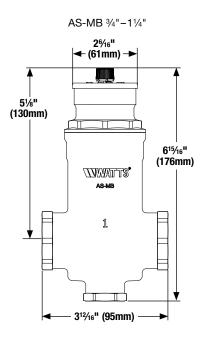


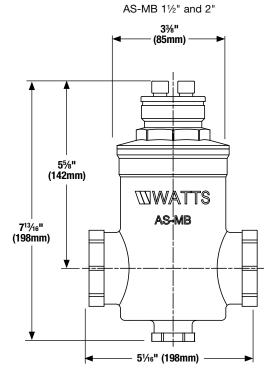
## Pressure - Temperature

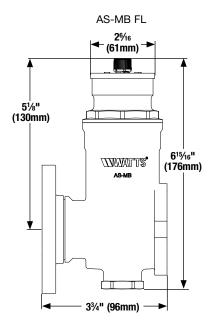
Maximum working pressure: 150psi (10.3 bar)

Maximum Operating Temperature: 240°F (116°C).

## **Dimensions**







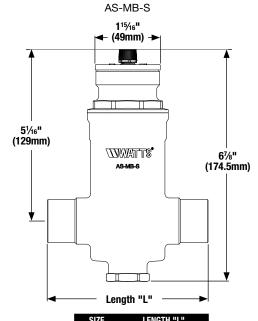
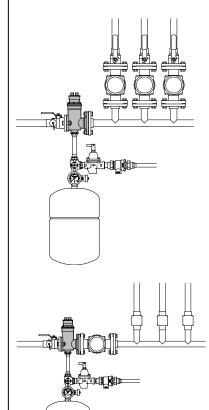
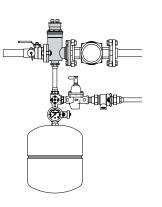


Chart for AS-MB-S only

SIZE	LENGIN L	
in.	in.	mm
3/4	41/2	114
1	43/4	121
11/4	<b>4</b> <sup>15</sup> ⁄ <sub>16</sub>	125

# |Typical Installations





Model AS-MB FL shown with Series PIPF Isolation Flange with Purge Port and Swivel Flange, Series RBFF Residential Boiler Fill Fitting, Series ETX Expansion Tank and Series B911S Bronze Combination Fill Valve and Backflow Preventer.



ES-AS-MB 1151 © 2011 Watts