Section 15108 – AIR RELEASE AND COMBINATION AIR / VACUUM VALVES

1. SCOPE. This section covers air release and combination air / vacuum valves as indicated on the drawings.

2. GENERAL. Equipment furnished and installed under this section shall be fabricated, assembled, erected, and placed in proper operating condition in full conformity with drawings, specifications, engineering data, instructions, and recommendations furnished by the equipment manufacturer, unless exceptions are noted by the Engineer.

2.01. Governing Standard: Except as modified or supplemented herein, all valves furnished under this section shall conform to the applicable requirements of AWWA C512.

2.02. General Equipment Stipulations. The General Equipment Stipulations shall apply to all equipment furnished under this section.

2.03. Acceptable Products. Valves provided under this section shall be as manufactured by Apco/Valve and Primer, GA Industries, or Multiplex Manufacturing, subject to compliance with the requirements set forth herein.

Air release valves shall be Apco/Valve and Primer "No. 200A", GA Industries "Figure 920", or Multiplex "Crispin Type N".

Three inch and smaller combination air valves shall be of the integral type with a valve assembly which functions both as an air and vacuum valve and an air release valve. Valves shall be Apco/Valve and Primer standard "Combination Air Valves" or Multiplex "Crispin Universal Air Release Valves".

2.04. Shop Painting. All interior and exterior ferrous metal surfaces, except stainless steel components, shall be shop painted for corrosion protection. The valve manufacturer's standard coating will be acceptable provided it is functionally equivalent to the specified coating and is compatible with the specified field painting. Field painting is covered in the painting section.

The following surfaces shall be painted:

Interior Surfaces	Epoxy.
Exterior Surfaces of Valves	Epoxy / Coal tar.
Polished or Machined Surfaces	Rust-preventative compound.

Interior epoxy coatings shall comply with AWWA C550 and shall be free of holidays. The total dry film thickness of shop-applied coatings shall be not less than:

Type of Coating	Minimum Dry Film Thickness
Coal Tar	6 mils
Epoxy	10 mils

2.05. Shutoff Valve. A shutoff valve shall be provided in the piping leading to each air release valve and combination air valve.

3. MATERIALS. Except as modified or supplemented herein, materials of construction shall comply with the governing standard. The use of stressed thermoplastic components will not be acceptable.

Valve Trim	Bronze or austenitic stainless steel.
Float	Austenitic stainless steel.
Shop Coatings	
Coal Tar	Kop-Coat "Bituminous Super Service Black" or Tnemec "46-449 Heavy Duty Black".
Epoxy	Cook "920-W-965 Epicon-MW HB Epoxy", Kop-Coat "Hi-Gard Epoxy", or Tnemec "Series 20 Pota-Pox".
Rust-Preventative	Houghton "Rust Veto 344", Rust-Oleum "R-9", or equal.

4. INSTALLATION. Valves shall be installed in accordance with the manufacturer's recommendations and as indicated on the drawings.

The exhaust from each valve shall be piped to a suitable disposal point acceptable to the Engineer.

5. DRAWINGS AND DATA. Complete assembly drawings, together with detailed specifications and data covering materials used and accessories forming a part of the valves furnished, shall be submitted in accordance with the submittals section.

End of Section