



# COMBINATION AIR VALVE

## Model C35

BERMAD C35 is a high quality combination air valve for a variety of irrigation networks and operating conditions. It relieves air during pipeline filling, allows efficient release of air pockets from pressurized pipes, and enables large volume air intake in the event of network draining.

With its advanced aerodynamic design, this valve provides excellent protection against air accumulation and vacuum formation, with improved sealing in low pressure conditions.



### Features & Benefits

- Straight flow body with large diameter automatic orifice: Higher than usual flow rates.
- Aerodynamic full-body kinetic shield: Prevents premature closing without disturbing air intake or discharge.
- Dynamic sealing: Prevents leakage under low pressure conditions (1.5 psi; 0.1 bar).
- Compact, simple and reliable structure whose parts are fully corrosion, chemical and fertilizer resistant: Lower maintenance and increased life span.
- Design in compliance with EN-1074 / 4 standard.
- Factory approval and Quality Control: Performance and specification tested and measured with specialized test bench, including vacuum pressure conditions.
- Field proven designed for use in irrigation applications with water quality such as river water, channel water, dam water or treated effluent with high reliability.

### Additional Features & Accessories

- Service Port fitted with 1/4"; DN6 plug (code P)
- Test point (code T)

### Inlet and Outlet Connection

- Inlets: male threaded 2"; DN50
- Outlets: Sideways, 1.5"; DN40 female threaded

### Orifice Specifications

Inlet Sizes	Automatic Orifice	Kinetic Orifice	
	Area	Diameter	Area
Inch	Sq Inch	inch	Sq Inch
mm	Sq mm	mm	Sq mm
2"	0.008	0.795	0.497
DN50	5.4	20.2	320

### Typical Applications

- Water networks: Protection against air accumulation and vacuum formation at elevations, slope change points and road / river crossings.

### Materials

- Body: Glass-reinforced Nylon
- Float Assembly: Polypropylene, Glass-reinforced Nylon.
- Elastomers: EPDM

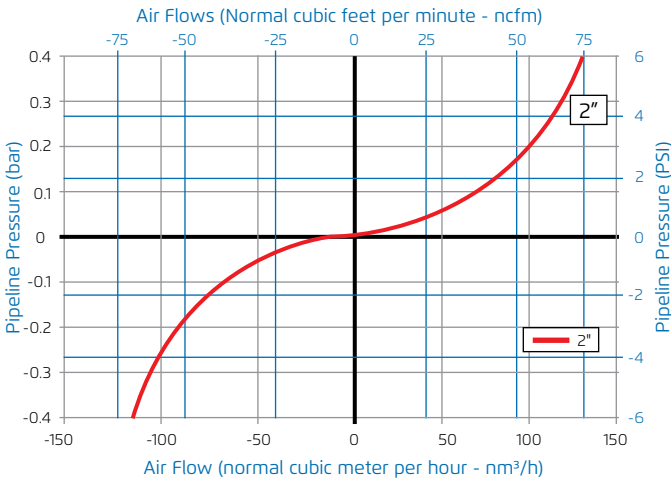
### Operational Data

- Pressure Rating: 230 psi; ISO PN16
- Minimum operating pressure: 1.5 psi; 0.1 bar
- Maximum operating pressure: 230 psi; 16 bar
- Media and operating temperature: Water, 33-140°F; 1-60°C

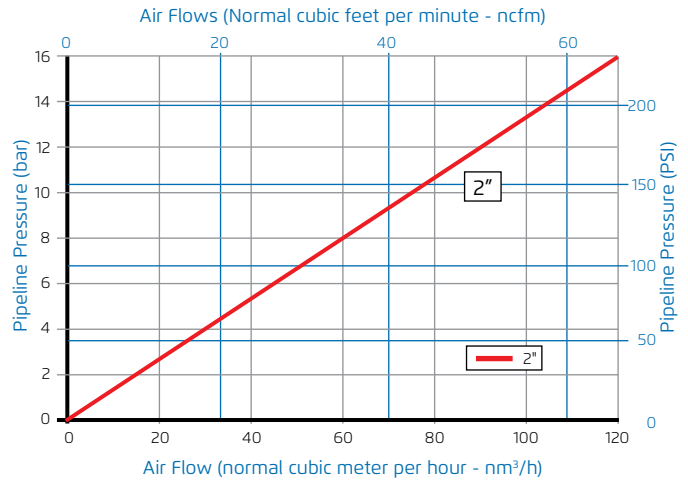


### Air Flow Performance Charts

**Air Relief and Intake** (Pipeline Filling, Drainin and Vacuum Conditions)

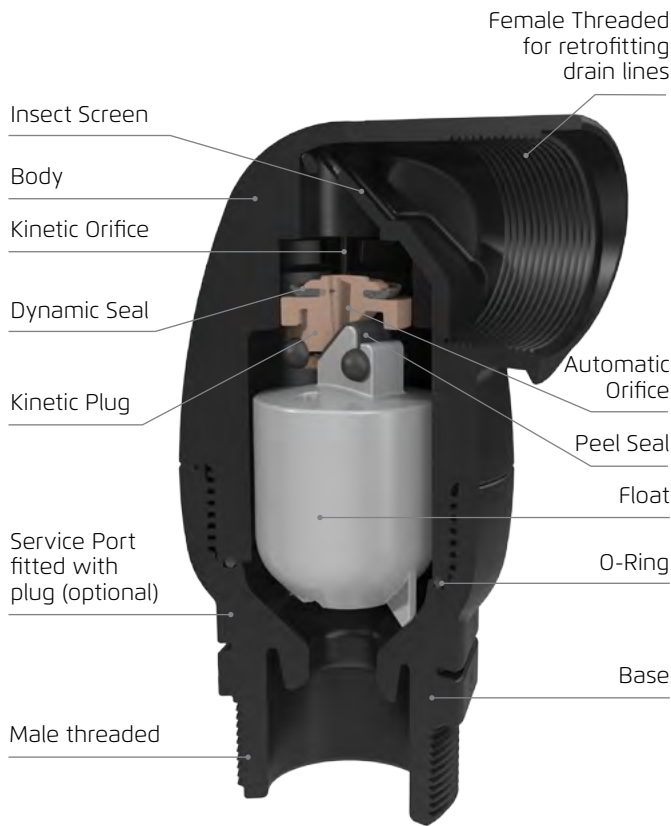


**Air Release** (Pressurized Operation)



Air relief and intake charts are based on actual measurements, made in Bermad Air Flow test bench, according to EN-1074/4 standard and refer to Side outlet.

### Cutaway



### Dimensions & Weights

Inlet Size	Connection	Width (D)	Height (H)	Weight
inch	---	inch	inch	lbs
mm		mm	mm	Kg
2"	Threaded	4.123	6.850	1.32
DN50		107	164	0.60

