

# AUTO DRAINS

## AD300, AD600

- Automatically drains any liquid collected inside the bowl.
- Automatically drains any liquid when pressure is lost inside the bowl.
- The drain cock is equipped with a fitting to prevent dirtying of surrounding equipment.
- Collected liquid can also be discharged manually.



### Specifications

Device type	Auto drain type	Remark
F.R.L. Combinations	C150	—
	C200	<b>AD300</b>
	C300	
	C400	<b>AD600</b>
	C600	
Filter regulators	FR150	—
	FR300	<b>AD300</b>
	FR600	<b>AD600</b>
Air filters	F150	—
	F300	<b>AD300</b>
	F600	<b>AD600</b>
Mist filters	MF300	<b>AD300</b>
	MF400	<b>AD600</b>
	MF600	
Micro mist filters	MMF150	<b>AD300</b>
	MMF300	<b>AD600</b>
	MMF400	
	DF300	
Drain filters	DF600	<b>AD300</b>
	DF900	<b>AD600</b>

Note: Models without auto drain have different body shapes. For this reason, they cannot be converted to auto drain type even if the bowl assembly is replaced.

### Symbol



### Order Codes

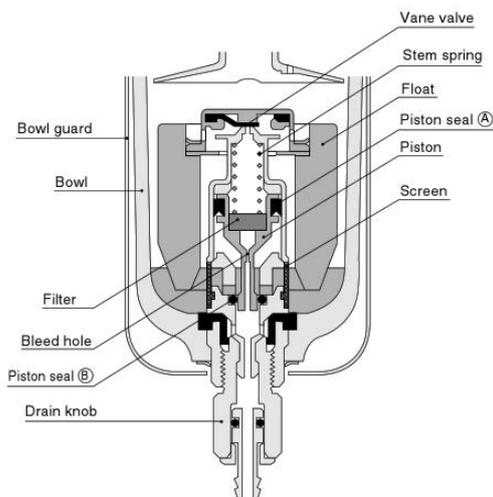
**AD**



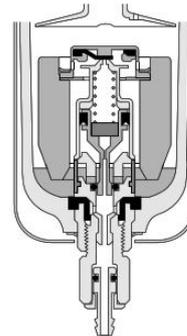
**Body size**  
**300** — For 300 series  
**600** — For 600 series

**Auto drain type drain cock assembly**  
 (with bowl and bowl guard)

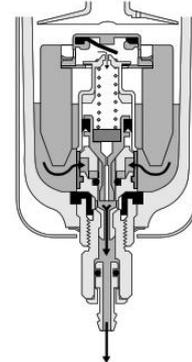
### Inner Construction



Condition of collected liquid



Condition of draining liquid



### Operation principles

When liquid collects inside the bowl, the float rises and opens up the vane valve. Air brought to the top of the piston forces the piston downward, opening up the bottom of the piston and expelling liquid that has passed through the screen. As the liquid is drained out, the float falls, closing the vane valve. Air at the top of the piston is released through a bleed hole, and air pushes up on the piston from the bottom, returning the unit to the normal state.

If pressure inside the bowl is lost, the stem spring pushes down on the piston to drain out all of the liquid. After the liquid has been drained out, the air inside the bowl is also released.

Remark: Air is released from the drain port until the supply pressure rises to 0.15MPa [22psi.]. In this situation, even rotating the drain knob will not prevent the air from bleeding out.