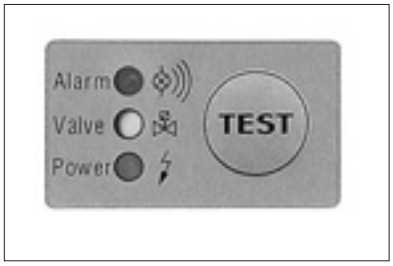
Automatic drain DB Series Energy saving & highly reliable

Two sensors prevent wasteful air consumption.

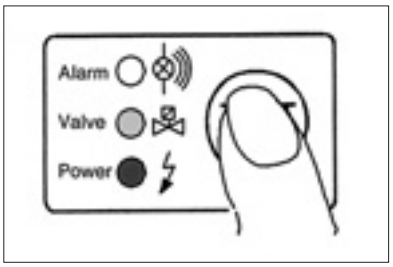
Control unit

● Electronic circuit with self-diagnosis function



The electronic circuit with self-diagnosis function constantly monitors the discharge status displaying it with LEDs. (excluding DB3003D)

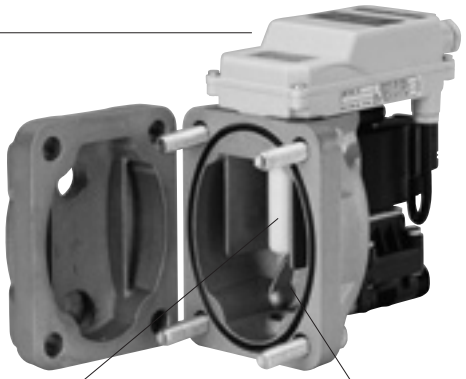
● Arbitrary discharge of drainage



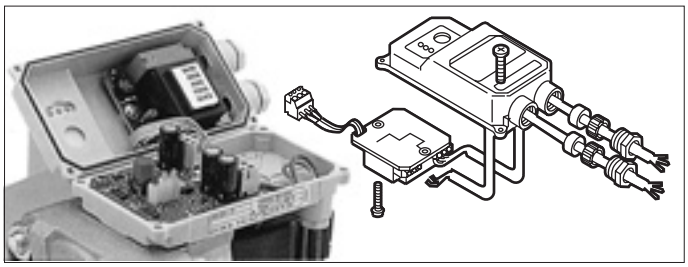
Drain can be discharged as desired by pressing the TEST button during operation check, etc. Added external test terminals. (excluding DB3003D)

● Simultaneous with alarm mode output, Self-avoidance operation is performed.

If drain discharge does not work normally, an alarm signal is output and self-recovery operation is repeated until the problem of the valve is removed. (excluding DB3003D)



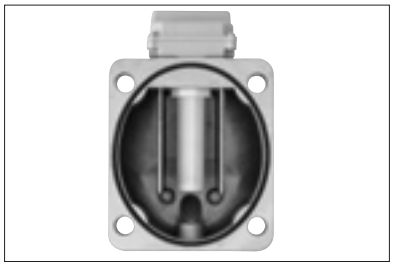
● Easy wiring



The power supply and control sections are compactly stored. The power supply section can be detached allowing you to connect the pipes easily. (excluding DB3003D)

Level sensor

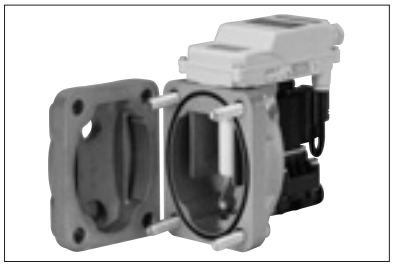
● Highly reliable level sensor



The sensor is protected by the resin cover. Stable performance is not affected by the drain quality.

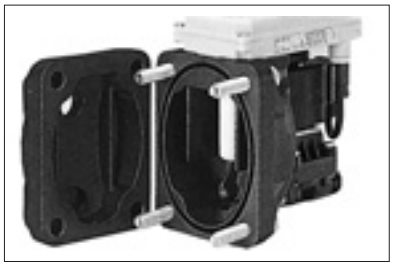
Tank

● Easy to clean inside the tank



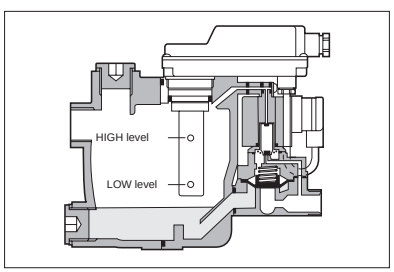
You can access inside the tank easily by simply removing four bolts without disconnecting the inlet pipe. (DB1024/3024/1090D/3090D)

● Oil-prohibited



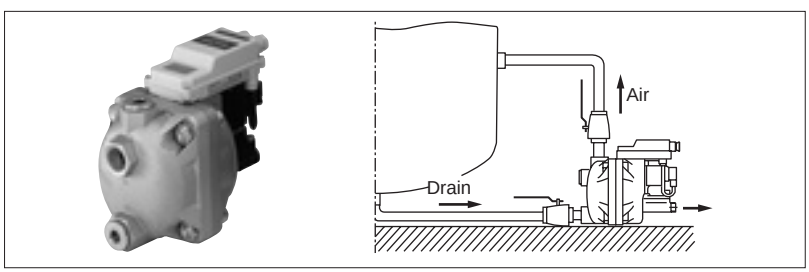
Rust proof treatment on the inner and outer surfaces of the housing. (DB3000 Series)

● Efficient use of compressed air



HIGH and LOW level sensors discharge drainage only, preventing wasteful air consumption. (DB1090D/3090D/3700)

● Port options that can be selected according to the installation condition



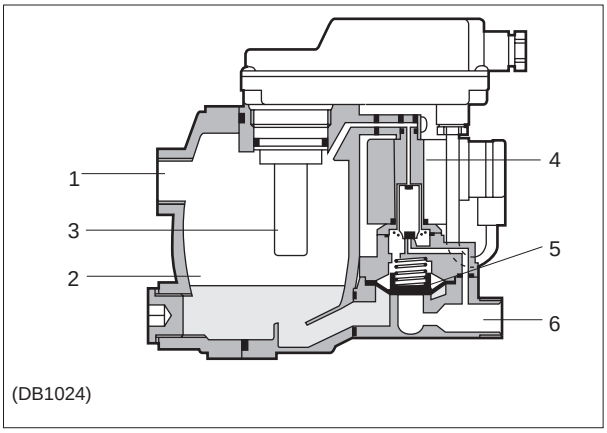
If the inlet pipe is connected to the bottom part and the amount of drain is large, the pipe at the top can be used as an air vent. (DB1024/3024/1090D/3090D/3700)

Automatic drain series map

Automatic drain DB Series						
Compressor RO (kW)		11 15 22	37	55 75	120 150	300 450 900
Outlet flow rate m^3/min (ANR)		1	5	10	50	100 500 1000
Compatible compressor	No-lubrication	DB3003D	DB3006E	DB3024	DB3090D	DB3700
	Lubrication		DB1006E	DB1024	DB1090D	

Drain sensor DBS1006

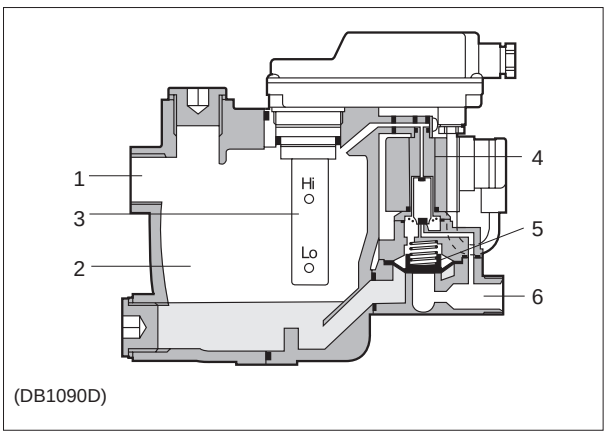
Operational explanation



(DB1024)

● DB Series single sensor (DB3003D, DB1006E/3006E, DB1024/3024)

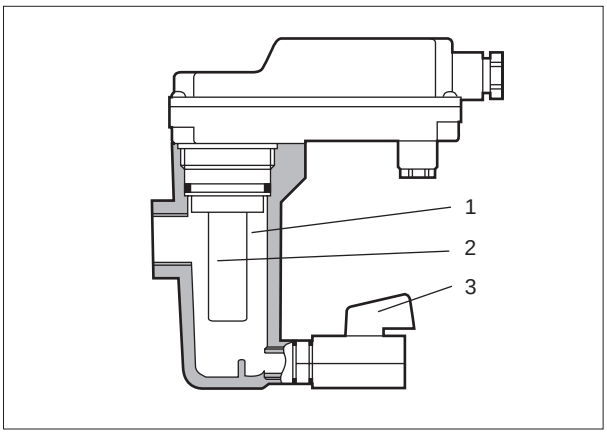
Drain passing the inlet pipe (1) accumulates in the tank (2). The diaphragm valve (5) is closed by air pressure inside the tank. The level sensor (3) is constantly monitoring the drain level.
When the level sensor (3) detects that the tank (2) is full of drain, it activates the pilot valve (4). This opens the diaphragm valve (5) letting drain flow out of the outlet (6).
The valve open time is controlled by the timer and air leakage can be minimized in various conditions. When drain cannot be discharged, the automatic drain enters the alarm mode in approximately 60 seconds where the red LED flashes and an alarm signal is output. In the alarm mode, the automatic drain tries self-recovery by opening the valve once in approximately four minutes.



(DB1090D)

● DB Series double sensor (DB1090D/3090D, DB3700)

Drain passing the inlet pipe (1) accumulates in the tank (2). The diaphragm valve (5) is closed by air pressure inside the tank. The level sensor (3) is constantly monitoring the drain level.
When the level sensor (3) detects that the tank (2) is filled with drain up to the high level (Hi) of the level sensor (3), it activates the pilot valve (4). This opens the diaphragm valve (5) letting drain flow out of the outlet (6).
The automatic drain system determines the accurate valve open time by calculating it from the drop rate of the drain level. The valve is closed completely to prevent leakage before the compressed air starts leaking.
When drain cannot be discharged, the automatic drain enters the alarm mode in approximately 60 seconds where the red LED flashes and an alarm signal is output. In the alarm mode, the automatic drain tries self-recovery by opening the valve once in approximately four minutes.



● DBS1006

Drain accumulates in the tank (1).
The level sensor (2) is constantly monitoring the drain level.
When the level sensor (2) detects that the tank (1) is full of drain, an alarm is output, the red LED flashes and an alarm signal is output (alarm mode). The drain cock (3) is normally kept closed. In the alarm mode, accumulated drain can be manually discharged from the drain cock (3). After discharge, the alarm mode ends and the system returns to the normal status.
(Drain is not discharged automatically since this product is not a drain discharger.)