



Resin solenoid valve for automatic watering

GSV resin solenoid valve

- For watering of greenbelts, protected horticulture, parks, and urban greenery
- Continuously energized, latch
- Pilot operated diaphragm

Main applications

- Irrigation and watering for protected horticulture
- Watering of parks and urban greenery
- Watering of gardens and indoor and outdoor plantings

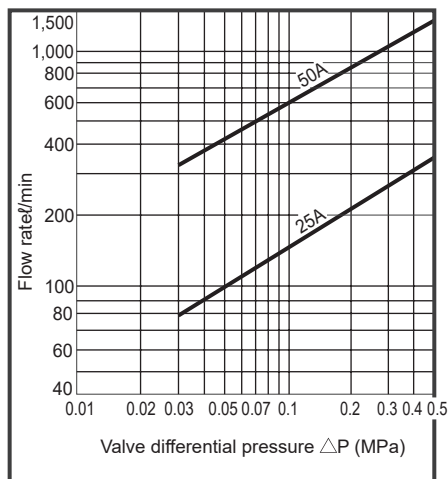
Overview

- Lightweight and low cost with a resin body
- Molded coil with excellent water resistance
- Diluted agricultural chemicals and liquid fertilizers can also be used *
- Equipped with a self-cleaning filter for pilot flow path protection
- Low water hammer
- Capable of battery control with a latch coil

Specifications

Item	GSV-25A-25	GSV-50A-25
Working fluid	Water/agricultural water/diluted agricultural chemicals/liquid fertilizers, etc. * Limited to fluids that will not cause corrosion of the wetted part materials.	
Max. working pressure MPa	0.5 (≈73 psi, 5 bar)	
Working pressure differential MPa	0.03 (≈4.4 psi, 0.3 bar) to 0.5 (≈73 psi, 5 bar)	
Proof pressure (water pressure) MPa	1.5 (≈220 psi, 15 bar)	
Fluid temperature °C	4 (39.2°F) to 40 (104°F) (no freezing)	
Ambient temperature °C	0 (32°F) to 50 (122°F)	
Valve seat leakage cm ³ /min	0.1 or less (water)	
Orifice size mm	25	50
Cv	10.4	42
Mounting orientation	Mount with coil on top.	
Port size	Rc1 or equiv.	Rc2 or equiv.
Drive method/voltage	Continuously energized: 24 VDC, 24/100/200 VAC (50/60 Hz) Latch pulse signal: P (voltage selection unnecessary) *1	
Weight kg	1	1.6
Rated voltage	24 VDC, 24/100/200 VAC (50/60 Hz), P type *1	
Power consumption W	AC/2.5, DC type/3	
Thermal class	Class 130 (B) (JIS C 4003)	
Leakage current mA	6 or less/24 VAC, 1.9 or less/100 VAC, 0.7 or less/200 VAC, 4 or less/24 VDC	

Flow characteristics



How to order

GSV - 50 A - 25 - DC24V

A Port size

B Drive method

C Voltage
*1

Code	Description
A Port size	
25	Rc1 or equiv.
50	Rc2 or equiv.
B Drive method	
Blank	Continuously energized
P	Latch pulse signal *1
C Voltage	
AC24V	24 VAC 50/60 Hz *2
AC100V	100 VAC 50/60 Hz *2
AC200V	200 VAC 50/60 Hz *2
DC24V	24 VDC *3

*1 P type is dedicated for use with controllers manufactured by CKD.

The voltage of the model No. is not required when placing an order.

Applicable controller

· RSC-S5, RSC-G series

· RSC-1WP, RSC-2WP

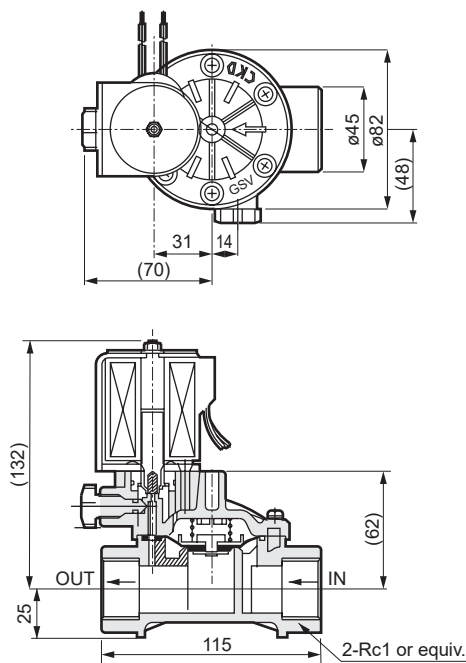
*2 The AC coils are all equipped with rectifying surge suppressors. (Half-wave)

*3 The 24 VDC type is equipped with a surge suppressor device.

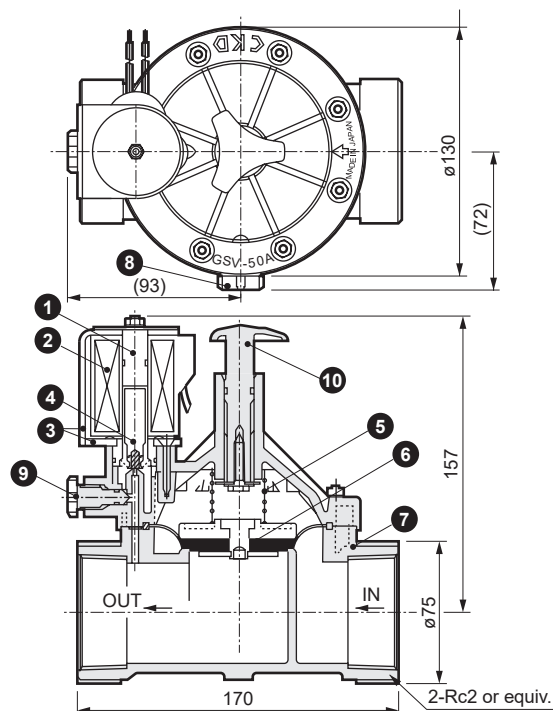
Internal structure and dimensions

- Lead wire color coding: DC coil - red black, less than 200 VAC - blue, 200 VAC or more - red
- Lead wire length: 700 mm

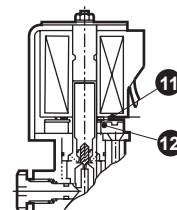
● GSV-25A-25



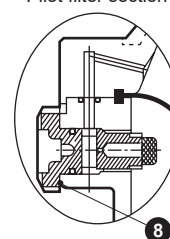
● GSV-50A-25



● P: Latch



Pilot filter section



No.	Part name	Material	No.	Part name	Material
1	Core assembly	SUS430	7	Body	PP
2	Coil	-	8	Pilot filter	PP, SUS
3	Core A/B	SUS430	9	Manual operation needle	PP
4	Plunger	K-M31	10	Flow rate adjusting handle	PP
5	Spring	SUS304	11	Ring plate	SUS430 (latch only)
6	Diaphragm assembly	NBR, PP, SUS	12	Magnet	DPM-2 (latch only)

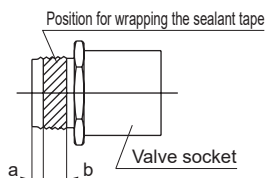
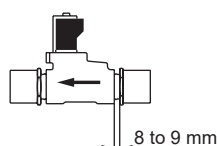
(Note) Components of No. 1, 4 to 10 are the wetted parts.

⚠ Precautions for valve socket piping

* Always read the precautions in the instruction manual before starting use.

* GSV, GSV2 types : Observe the common precautions.

Securely wrap sealant tape around the threaded part of the valve socket 5 times (50 A) or 3 times (25 A) and screw the socket in until the dimension of the part below the screw head is 8 to 9 mm, as shown below. Screwing the bolt too far in will cause damage. Do not use metal nipples.



Bore size	Dimensions		Tightening torque N·m
	a	b	
25A	5	15	5.9
50A	7	17	9.3

* When the piping is long (100 m or more), set the working pressure lower by approximately 20% to prevent water hammer from occurring.