# CHANGEOVER VALVES, ELECTRONIC EXPANSION VALVES / Type RKV



Type RKV-H, RKV-B



Type RKV-C

Coil sold separately

High Volume OEM Item

Drawings must be exchanged for purchase. Please contact SAGINOMIYA for more details.

## TYPE NUMBER SELECTION

Catalog No.	Function	* 1 Refrigerant	Port size φ (mm)	Connection (Solder) (mm)		M.O.P.D.	* 2 Wt.
				Inlet (A)	Outlet (B, C, D)	(MPa)	(kg)
RKV-H06D	Expansion valve	R134a R600a	0.6	-	φ 2.2 ID	1.0	0.03
RKV-B10D	2-way changeover valve		1.0		φ 1.9 ID	1.8	
RKV-C08D	3-way changeover valve		0.8			2.8	
RKV-C10D			1.0	φ 2.1 ID		1.8	
RKV-C08DWL	3-way changeover valve with expansion function		0.8			1.0	
RKV-K10D	4-way changeover valve		1.0		φ 2.2 ID	1.8	

\* 1 For other refrigerants, please contact us.

\* 2 Valve only. (without coil)



Type RKV-K

### FEATURES

flow).

### APPLICATIONS

- Household refrigerators
- Commercial refrigerators / freezers
- Vending machines, etc.

# COIL SPECIFICATIONS

Catalog No. (Coil)	Rated voltage	Current	* 1 Insulation class	Enclosure	* 2 Wt. (kg)
RKV- R	12V.DC ± 10%	0.26A / Phase (20℃)	Class E molded	IP66	0.1

\*1 Compliant with IEC60085, 60335-2-40.

\* 2 For lead wire length of 300mm.

### **COMMON SPECIFICATIONS**

- Max. working pressure : 3.0 MPa
- Fluid temperature : -30 to 65°C

(It should be 50% or less on energizing ratio)

- Ambient temperature : -30 to 65℃
  - (It should be 50% or less on energizing ratio)

• Highly durable (Operating life of 300,000 cycles at full stroke).

• Capable of regulating multiple flow settings (Open, closed, low-

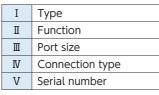
• Energy-saving design (No holding power required).

• Standards : UL, cUL (Please contact us for details.)

- Ambient humidity : 95%RH or less
- Excitation method : 1-2 phase, Uni-polar

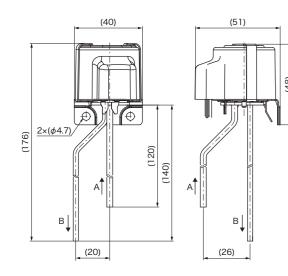
# DESCRIPTION OF CATALOG NO.

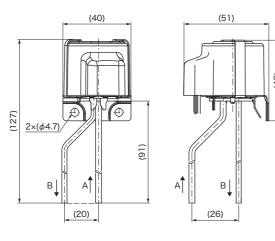
 $\frac{\mathsf{RKV}}{\mathsf{I}} - \frac{\mathsf{C}}{\mathsf{II}} \frac{\mathsf{O8}}{\mathsf{III}} \frac{\mathsf{D}}{\mathsf{IV}} \frac{\mathsf{D}\mathsf{D}}{\mathsf{V}}$ 



\* Coil is not included with the valve body. Please purchase it separately.

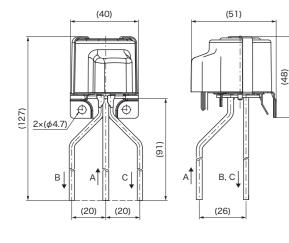




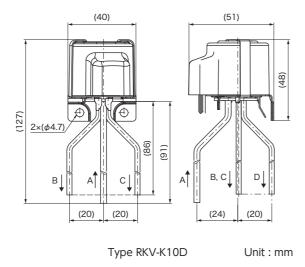


Type RKV-B10D

Type RKV-H06D

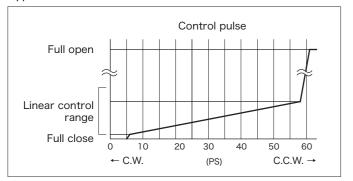


Type RKV-C



# VALVE OPERATION CHARACTERISTICS

#### Type RKV-H06D

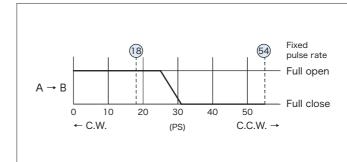


#### Control pulse

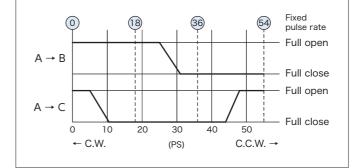
Pulse	Flow direction A $\rightarrow$ B
0	Full close
5 to 55	Linear control
64	Full open

### VALVE OPERATION CHARACTERISTICS

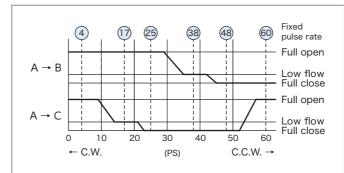
Type RKV-B10D\*



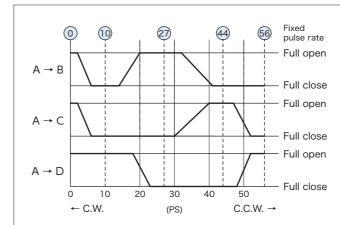
Type RKV-C08D, C10D\*



Type RKV-C08DWL\*



### Type RKV-K10D \*



\* Type RKV-B, C and K can be used only at fixed pulse rate.

#### Flow direction (Fixed pulse rate)

Mode	Pulse	Flow direction	
Mode	Fuise	A → B	
1	18	Full open	
2	54	Full close	

#### Flow direction (Fixed pulse rate)

Mode Pulse		Flow direction		
Mode	Fuise	A → B	$A \rightarrow C$	
1	0	Full open	Full open	
2	18	Full open	Full close	
3	36	Full close	Full close	
4	54	Full close Full oper		

#### Flow direction (Fixed pulse rate)

Mode	Pulse	Flow direction			
Mode		A → B	$A \rightarrow C$		
1	4	Full open	Full open		
2	17	Full open	Minimal open		
3	25	Full open	Full close		
4	38	Minimal open	Full close		
5	48	Full close	Full close		
6	60	Full close Full open			

#### Flow direction (Fixed pulse rate)

Mode	Pulse	Flow direction			
Mode		A → B	A → C	A → D	
1	0	Full open	Full open	Full open	
2	10	Full close	Full close	Full open	
3	27	Full open	Full close	Full close	
4	44	Full close	Full open	Full close	
5	56	Full close	Full close	Full open	