

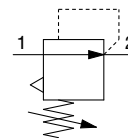
Regulator

AR20-B to AR60-B

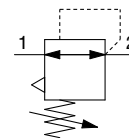
Regulator with Backflow Function

AR20K-B to AR60K-B

Symbol
Regulator



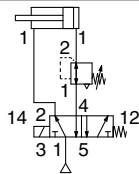
Regulator with
Backflow Function



- With the backflow function, it incorporates a mechanism to exhaust the air pressure in the outlet side reliably and quickly.

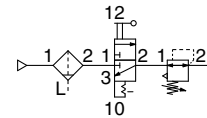
Example 1)

When the pressure in the rear and the front of the cylinder differs:



Example 2)

When the air supply is cut off and releasing the inlet pressure to the atmosphere, the residual pressure release of the outlet side can be ensured for a safety purpose.



How to Order

Refer to page 65 for size 10.

AR **30** **K** - **03** **BE** - **B** -

1

2

3

4

5

6

- Option/Semi-standard: Select one each for a to g.
- Option/Semi-standard symbol: When more than one specification is required, indicate in alphanumeric order.
Example) AR30K-03BE-1NR-B

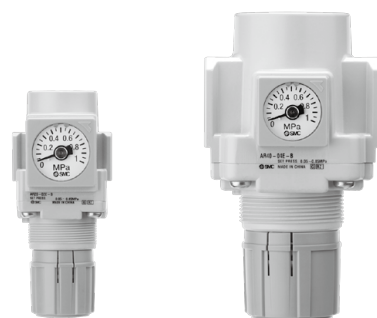
Made to order

(Refer to pages 77 to 79 for details.)

		Symbol	Description	①						
				Body size						
				20	25	30	40	50	60	
②	With backflow function	Nil	Without backflow function	●	●	●	●	●	●	
		K*1	With backflow function	●	●	●	●	●	●	
+										
③	Pipe thread type	Nil	Rc	●	●	●	●	●	●	
		N	NPT	●	●	●	●	●	●	
		F	G	●	●	●	●	●	●	
+										
④	Port size	01	1/8	●	—	—	—	—	—	
		02	1/4	●	●	●	●	—	—	
		03	3/8	—	●	●	●	—	—	
		04	1/2	—	—	—	●	—	—	
		06	3/4	—	—	—	●	●	—	
		10	1	—	—	—	—	●	●	
+										
⑤	a	Mounting	Nil	Without mounting option	●	●	●	●	●	●
			B*3	With bracket	●	●	●	●	●	●
			H	With set nut (for panel mount)	●	●	●	●	—	—
	+									
	b	Pressure gauge*4	Nil	Without pressure gauge	●	●	●	●	●	●
			E	Square embedded type pressure gauge (with limit indicator)	●	●	●	●	●	●
			G	Round type pressure gauge (with limit indicator)	●	●	●	●	●	●
			M	Round type pressure gauge (with color zone)	●	●	●	●	●	●
		Digital pressure switch*5	E1	Output: NPN output, Electrical entry: Wiring bottom entry	●	●	●	●	●	●
			E2	Output: NPN output, Electrical entry: Wiring top entry	●	●	●	●	●	●
			E3	Output: PNP output, Electrical entry: Wiring bottom entry	●	●	●	●	●	●
			E4	Output: PNP output, Electrical entry: Wiring top entry	●	●	●	●	●	●

Regulator **AR20-B to AR60-B Series**

Regulator with Backflow Function **AR20K-B to AR60K-B Series**



AR20-B, AR20K-B AR40-B, AR40K-B

AC

AF+AR+AL

AW+AL

AF+AR

AF+AFM+AR

AW+AFM

Attachment

AF

AFM / AFD

AR

AL

AW

		Symbol	Description	1								
				Body size								
				20	25	30	40	50	60			
6	Semi-standard	c	Set pressure *6	Nil	0.05 to 0.85 MPa setting	●	●	●	●	●	●	
				1	0.02 to 0.2 MPa setting	●	●	●	●	●	●	
		+										
		d	Exhaust mechanism	Nil	Relieving type	●	●	●	●	●	●	
				N	Non-relieving type	●	●	●	●	●	●	
		+										
		e	Flow direction	Nil	Flow direction: Left to right	●	●	●	●	●	●	
				R	Flow direction: Right to left	●	●	●	●	●	●	
		+										
		f	Knob	Nil	Downward	●	●	●	●	●	●	
				Y	Upward	●	●	●	●	●	●	
		+										
		g	Pressure unit	Nil	Name plate and pressure gauge in SI units: MPa	●	●	●	●	●	●	
				Z*7	Name plate and pressure gauge in imperial units: psi	○*9	○*9	○*9	○*9	○*9	○*9	
				ZA*8	Digital pressure switch: With unit selection function	△*10	△*10	△*10	△*10	△*10	△*10	

- *1 Set the inlet pressure to at least 0.05 MPa higher than the set pressure.
 *2 Options B, G, H, M are not assembled and supplied loose at the time of shipment.
 *3 Assembly of a bracket and set nuts (applicable to the AR20(K)-B to AR40(K)-B). Including 2 mounting screws for the AR50(K)-B and AR60(K)-B.
 *4 When the pressure gauge is attached, a 1.0 MPa pressure gauge will be fitted for standard (0.85 MPa) type. 0.4 MPa pressure gauge for 0.2 MPa type.
 *5 When choosing with H (panel mount), the installation space for lead wires will not be secured. In this case, select "wiring top entry" for the electrical entry. (Select "wiring bottom entry" when the semi-standard Y is chosen simultaneously.)
 *6 Pressure can be set higher than the specification pressure in some cases, but use pressure within the specification range.

- *7 For pipe thread type: NPT.
 This product is for overseas use only according to the new Measurement Act. (The SI unit type is provided for use in Japan.)
 Cannot be used with M: Round type pressure gauge (with color zone). Available by request for special.
 The digital pressure switch will be equipped with the unit selection function, setting to psi initially.
 *8 For options: E1, E2, E3, E4. This product is for overseas use only according to the new Measurement Act. (The SI unit is provided for use in Japan.)
 *9 ○: For pipe thread type: NPT only
 *10 △: Select with options: E1, E2, E3, E4.

Standard Specifications

Model	AR20-B	AR25-B	AR30-B	AR40-B	AR40-06-B	AR50-B	AR60-B
Port size	1/8, 1/4	1/4, 3/8	1/4, 3/8	1/4, 3/8, 1/2	3/4	3/4, 1	1
Pressure gauge port size *1	1/8						
Fluid	Air						
Ambient and fluid temperature *2	-5 to 60°C (with no freezing)						
Proof pressure	1.5 MPa						
Maximum operating pressure	1.0 MPa						
Set pressure range	0.05 to 0.85 MPa						
Construction	Relieving type						
Weight [kg]	0.16	0.21	0.29	0.44	0.47	1.17	1.22

- *1 Pressure gauge connection threads are not available for F.R.L. unit with a square embedded type pressure gauge or with a digital pressure switch.
 *2 -5 to 50°C for the products with the digital pressure switch