

How to order

SGB – 30 – S4

Note) 1 spare rubber film is attached.

①

① Rubber film inner diameter

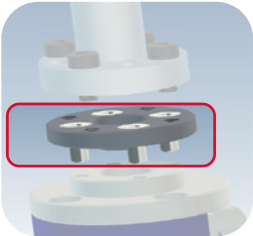
20	φ20
30	φ30

②

② Rubber material

S4	Silicone rubber
N4	NBR
SM	Metal containing silicone rubber

Maintenance parts



SGB-FB

Rubber only

SGBG – 20 – S4

Cushion rubber (With filter mesh)

SGB – CR – 20

Spring band (Set)

SGB – SB – 20

Robot hand kit compatible parts

SGB – FB

Note) FB is flange base for mounting SGB-20 to robot hand kit and CRK series flange.

Specifications

Item	Unit	Specification	
Cup inner diameter	–	20	30
Fluid	–	Oil-free compressed air	
Operating ambient temperature	℃	0~50(Without frozen)	
Operating pressure range	MPa	0.1~0.4	
Vacuum performance	Rated pressure	MPa	0.35
	Nozzle diameter	mm	0.5 0.7
	Vacuum pressure	-kPa	-87
	Air consumption	L/min	15 26
Exhausted air sound volume	dB	65	70
Mass	Band	g	160 340
	Rubber film only	g	10 30
Relief valve pressure	kPa	3	
Dimension for mounting parts	–	P.C.D20(M4) Recommended torque : 1.5N・m	P.C.D25 (M4) Recommended torque : 1.5N・m

Rubber film specifications

Mark	Material	Hardness (A/S)	Ambient temperature range	Color
S4	Silicone rubber	40	-60~250℃	Translucent light blue
N4	Nitrile rubber	40	-27~120℃	Black
SM	Metal containing silicone rubber	55	-60~250℃	Grey

Note) SM is material that reacts with metal detector.

*Specifications may change without prior notice.
*Please refer to the catalog and instruction manual about How to use, notes

BALLOON HAND

SGB series





Wide range of workpieces

Three circular images arranged horizontally. The first circle on the left contains a brown, textured potato. The middle circle contains a green and white bottle of dish soap, tilted to show its label. The third circle on the right contains a bright yellow lemon.



The diagram illustrates a built-in vacuum pump system for a rubber film. The central component is a vacuum pump (CONVUM) that generates a vacuum. This vacuum is used to draw air from the space between the rubber film and the underlying structure, creating a seal. The system includes a supply air inlet (rated pressure 0.35Mpa) and a relief valve to release excess pressure. The vacuum pump also exhausts air, which is used to inflate the rubber film. The diagram shows the flow of air from the supply, through the pump, and into the rubber film, as well as the flow of air from the space between the film and the structure into the pump.

built-in

actor) by

sed air.

Released exhausted air

Generates vacuum by CONVUM

Supply air
(Rated pressure 0.35Mpa)

Releases excess
pressure by relief valve

Exhausted air flowing to rubber film

Generating
VACUUM is
BALLOON
enables
hold the

Positive pressure

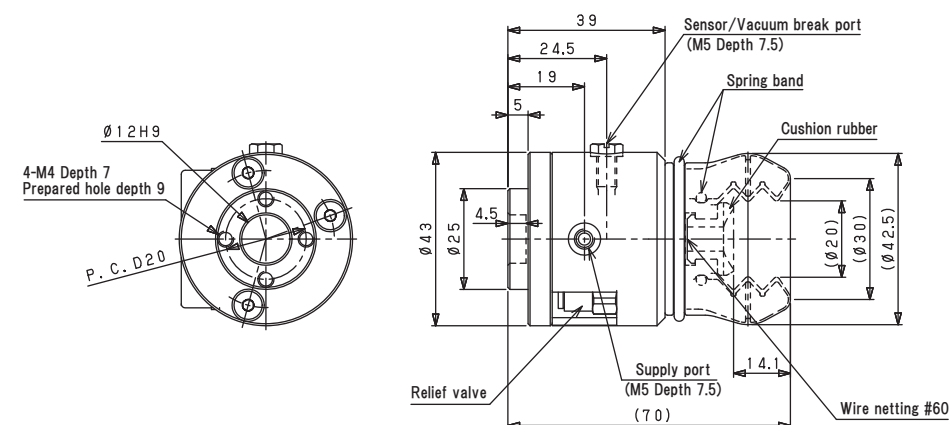
Vacuum pressure

Positive pressure

Inflates rubber film with
CONVUM exhausted air



SGB-20-##



M5 Depth 7

Prepared hole depth 9

Ø 12 H9

P.C. Ø 25

18.5

37

29.5

22.5

18.5

5

Sensor/Vacuum break port
(M5 Depth 7.5)

Spring band

Cushion rubber

Relief valve

Supply port
(R c 1 / 8)
(Ø 1,5)

Wire netting #60

Ø 66

Ø 34

4.5

23

(Ø 30)

(Ø 50)

(71)

No.	Part name	Material	Other
①	Body	A L	Anodizing treatment
②	Adapter	A L	Anodizing treatment
③	Relief valve	SUS/FKM	No treatment
④	Nozzle kit	A L ・ NBR	No treatment
⑤	Nozzle end	A L	No treatment
⑥	Exhaust cover	A L	Anodizing treatment
⑦	Rubber film	Si, NBR	
⑧	Cushion rubber	Si	
⑨	Spring band	SUS	
⑩	Filter mesh	SUS	#60
-	Plug	Brass	Nickel
-	Screw, Hard ball	SUS/Fe	
-	O ring	NBR	

