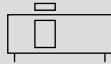


Rodless cylinder double acting

# SRL3 Series

- Bore size:  $\phi 12$ ,  $\phi 16$ ,  $\phi 20$ ,  $\phi 25$ ,  $\phi 32$ ,  $\phi 40$ ,  $\phi 50$ ,  $\phi 63$ ,  $\phi 80$ ,  $\phi 100$  or equiv.

JIS symbol



## Specifications

Descriptions	SRL3										
	Bore size	mm	$\phi 12$	$\phi 16$	$\phi 20$	$\phi 25$	$\phi 32$	$\phi 40$	$\phi 50$	$\phi 63$	$\phi 80$
Actuation	Double acting										
Working fluid	Compressed air										
Max. working pressure MPa	0.7 ( $\approx 100$ psi, 7 bar)										
Min. working pressure MPa	0.2 ( $\approx 29$ psi, 2 bar)			0.1 ( $\approx 15$ psi, 1 bar)				0.05 ( $\approx 7.3$ psi, 0.5 bar)			
Proof pressure MPa	1.05 ( $\approx 150$ psi, 10.5 bar)										
Ambient temperature $^{\circ}\text{C}$	5 ( $41^{\circ}\text{F}$ ) to 60 ( $140^{\circ}\text{F}$ )										
Port size	M5			Rc1/8		Rc1/4		Rc3/8		Rc1/2	
Stroke tolerance mm	$^{-2.0}_0$ (to 1000), $^{-2.5}_0$ (to 3000), $^{-3.0}_0$ (to 5000)										
Working piston speed mm/s	50 to 2000 (standard piping) (*1)										
Cushion	Air cushion										
Lubrication	Not required (use turbine oil class 1 ISO VG32 if necessary for lubrication. Once lubricated, the cylinder will need periodic lubrication.)										

\*1: For common port piping, the working piston speed varies depending on the stroke length. Contact CKD.

## Allowable absorbed energy

Bore size (mm)	Cushioned		Without cushion	With shock absorber (initial set point)	
	Max absorbed energy (J)	Cushion stroke (mm)	Max absorbed energy (J)	Absorbed energy (J)	Effective stroke (mm)
$\phi 12$ or equiv.	0.03	14.5	0.003	2.4	5.5
$\phi 16$ or equiv.	0.22	19.2	0.007	2.4	5.5
$\phi 20$ or equiv.	0.59	22.2	0.010	5.7	7
$\phi 25$ or equiv.	1.40	20.9	0.015	10	9
$\phi 32$ or equiv.	2.57	23.5	0.030	18	13
$\phi 40$ or equiv.	4.27	23.9	0.050	50	16.5
$\phi 50$ or equiv.	9.13	24.9	0.072	86	21
$\phi 63$ or equiv.	17.4	29.6	0.138	86	21
$\phi 80$ or equiv.	40	45.8	0.393	143	25
$\phi 100$ or equiv.	67	45.8	0.622	143	25

## Stroke length

Bore size (mm)	Standard stroke length (mm)	Max. stroke length (mm)	Min. stroke length (mm)
$\phi 12$ or equiv.	200/300 400/500 600/700 800/900 1000	5000	1
$\phi 16$ or equiv.			
$\phi 20$ or equiv.			
$\phi 25$ or equiv.			
$\phi 32$ or equiv.			
$\phi 40$ or equiv.			
$\phi 50$ or equiv.			
$\phi 63$ or equiv.			
$\phi 80$ or equiv.			
$\phi 100$ or equiv.			

\* The custom stroke length is available in 1 mm increments.

## Number of installed M type switches and min. stroke length (mm)

Switch quantity	1		2		3		4		5		6	
	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 16$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 20$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 25$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 32$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 40$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 50$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 63$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 80$ or equiv.	25		50		100		150		200		250	
$\phi 100$ or equiv.	25		50		100		150		200		250	

Note: Values in ( ) are the min. stroke length with switch of the full stroke length adjustable.

## Number of installed T type switches and min. stroke length (mm)

Switch quantity	1		2		3		4		5		6	
	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 16$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 20$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 25$ or equiv.	10	10	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 32$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 40$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 50$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 63$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 80$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250
$\phi 100$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250

Note: Values in ( ) are the min. stroke length with switch of the full stroke length adjustable.

### Switch specifications (M type switch)

- 1-color/2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire		
	M2V,M2H	M2WV (2-color display)	M3H/M3V	M3PH/M3PV (custom order)	M3WV
Applications	Dedicated for programmable controller		For programmable controller, relay, IC circuit, compact solenoid valve		
Output method	-		NPN output	PNP output	NPN output
Power supply voltage	-		4.5 to 28 VDC		10 to 28 VDC
Load voltage	10 to 30 VDC		30 VDC or less		
Load current	5 to 30 mA		100 mA or less	100 mA or less	100 mA or less
Indicator lamp	LED (Lit when ON)	Red/green LED (Lit when ON)	LED (Lit when ON)	Yellow LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 µA or less	0.05 mA or less	10 µA or less
Weight	g 1 m:22 3 m:57 5 m:93				
Descriptions	MOV,M0H		Reed 2-wire		
	M0V,M0H		M5V,M5H		
Applications	Programmable controller, relay		For programmable controller, relay, IC circuit (without indicator lamp), serial connection		
Power supply voltage	-		-		
Load voltage	12/24 VDC	110 VAC	5/12/24 VDC		110 VAC or less
Load current	5 to 50 mA	7 to 20 mA	50 mA or less		20 mA or less
Indicator lamp	LED (Lit when ON)		Without indicator lamp		
Leakage current	0 mA				
Weight	g 1 m:22 3 m:57 5 m:93				

\*1 : M0\* switch can be used for 24 VAC and 48 VAC within load current range of 7 to 20 mA.

\*2: Refer to Ending Page 1 for other switch specifications.

\*3: Dimensions depend on switch model No. Refer to Ending Page 13 for details.

### Switch specifications (T type switch)

- 2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire	
	T2YH/T2YV	T2WH/T2WV	T3YH/T3YV	T3WH/T3WV
Applications	Dedicated for programmable controller		For programmable controller, relay	
Output method	-		NPN output	NPN output
Power supply voltage	-		10 to 28 VDC	
Load voltage	10 to 30 VDC	24 VDC ±10%	30 VDC or less	
Load current	5 to 20 mA		50 mA or less	
Indicator lamp	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 µA or less	
Weight	g 1 m:33 3 m:87 5 m:142		1 m:18 3 m:49 5 m:80	
			1 m:33 3 m:87 5 m:142 1 m:18 3 m:49 5 m:80	

- For AC magnetic field

Descriptions	Proximity switch	
	T2YD,T2YDT	
Applications	Dedicated for programmable controller	
Indicator lamp	Red/green LED (Lit when ON)	
Load voltage	24 VDC ±10%	
Load current	5 to 20 mA	
Internal voltage drop	6V or less	
Leakage current	1.0 mA or less	
Weight	g 1 m:61 3 m:166 5 m:272	

Note: This switch cannot be used in DC magnetic field.

### Cylinder weight

Unit: kg

Bore size (mm)	Weight for 0 mm stroke length			Mounting bracket weight		Additional weight per St = 100mm
	Basic (00)	Foot		T type	M type	
		(LB)	(LB1)			
φ12 or equiv.	0.24	0.25	0.26	0.005	0.001	0.10
φ16 or equiv.	0.32	0.33	0.35			0.13
φ20 or equiv.	0.52	0.54	0.58			0.18
φ25 or equiv.	1.0	1.1	1.1			0.28
φ32 or equiv.	1.5	1.6	1.7			0.36
φ40 or equiv.	2.4	2.5	-			0.53
φ50 or equiv.	3.5	3.6	-			0.75
φ63 or equiv.	6.1	6.4	-			1.11
φ80 or equiv.	18.4	19.0	-			2.32
φ100 or equiv.	26.2	27.2	-			3.38

Refer to  
the weight  
in the switch  
specifications.

SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVP/N2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

# SRL3 Series

## How to order

Without switch (built-in magnet for switch)

**SRL3 - 00 - 12 B - 200**

With switch (built-in magnet for switch)

**SRL3 - 00 - 12 B - 200 - M0H - R - B**

**A** Mounting  
\*1, \*2

**B** Bore size

**C** Port thread

**D** Cushion

**E** Stroke length

**F** Switch model No.  
\*4

**G** Switch quantity

**H** Option  
\*5, \*6  
\*7, \*8  
\*9

### ⚠ Precautions for model No. selection

\*1 : Mounting bracket will be shipped assembled with the product.

\*2 : For 12, 16, 20, 25 and 32 bore sizes with option code "R" or "T", the mounting will be "00" or "LB1".  
(Piping with "LB" is not possible for option codes "R" and "T".)

\*3 : Refer to page 1556 for the min. stroke length with switch.

\*4 : Switches other than (F) Switch model No. are also available. (Custom order) Refer to Ending Page 1 for details.

\*5 : "\*" of L\* and N\* indicates the number of sets. When more than one set are necessary, specify "L2" (for LB) or "N2" (for LB1). 2 pcs./set

\*6 : For the port and cushion needle position codes, refer to dimensions on pages 1564 to 1568.

\*7 : In the case of the standard with  $\phi 12$  to  $\phi 25$ , remove the cover, attach a flat nut and install the full stroke length adjusting bracket. A flat nut is attached to option "A3" to enable retrofitting the full stroke length adjusting bracket without removing the cover.

\*8 : In "H", the thread size for  $\phi 12$  and  $\phi 16$  will be "M4" and that for  $\phi 20$  will be "M5".

\*9 : Check the option combinations in "Option selection table" on the next page.

\*10 : Copper and PTFE free as standard. (Except for type with shock absorber)

[Example of model No.]

**SRL3-00-12B-200-M0H-R-B**

Model: Rodless cylinder

- A** Mounting : Basic
- B** Bore size :  $\phi 12$  mm
- C** Port thread : Rc thread
- D** Cushion : Both sides cushioned
- E** Stroke length : 200 mm
- F** Switch model No. : Reed M0H switch, lead wire 1 m
- G** Switch quantity : 1 on R side
- H** Option : Port position F, cushion needle position B

Code	Content
------	---------

A Mounting	
00	Basic
LB	Axial foot
LB1	Axial foot ( $\phi 12$ to $\phi 32$ only)

B Bore size (mm)	
12	$\phi 12$
16	$\phi 16$
20	$\phi 20$
25	$\phi 25$
32	$\phi 32$
40	$\phi 40$
50	$\phi 50$
63	$\phi 63$
80	$\phi 80$
100	$\phi 100$

C Port thread	
Blank	Rc thread
N	NPT thread ( $\phi 20$ or more) (custom order product)
G	G thread ( $\phi 20$ or more) (custom order product)

D Cushion	
B	Both sides cushioned
R	R side cushioned
L	L side cushioned
N	Without cushion

E Stroke length (mm)		
Bore size	Stroke length *3	Custom stroke length
$\phi 12$ to $\phi 100$	1 to 5000	In 1 mm increments

F Switch model No.						
Axial lead wire	Radial lead wire	Reed Contact	Voltage		Indicator lamp	Lead wire
			AC	DC		
M0H*	M0V*	●	●	●	1-color display	2-wire
M5H*	M5V*		●	●	Without indicator lamp	
M2H*	M2V*		●	●	1-color display	
-	M2WV*	●	●	●	2-color display	2-wire
M3H*	M3V*		●	●	1-color display	
-	M3WV*		●	●	2-color display	
M3PH*	M3PV*	●	●	●	1-color display (custom)	3-wire
T2WH*	T2WV*		●	●	2-color display	
T2YH*	T2YV*		●	●		2-color display
T3WH*	T3WV*	●	●	●	3-wire	
T3YH*	T3YV*		●	●		
T2YD*	-		●	●	2-color display	2-wire
T2YDT*	-	●	●	for AC magnetic field		

* Lead wire length	
Blank	1 m (standard)
3	3 m (option)
5	5 m (option)

G Switch quantity	
R	1 on R side
L	1 on L side
D	2
T	3
4	4 (when there are more than 4 switches, indicate switch quantity.)

H Option		Bore size ( $\phi$ )									
		12	16	20	25	32	40	50	63	80	100
A	Both-sides full stroke adjustable, shock absorber	●	●	●	●	●	●	●	●	●	●
A1	R side full stroke adjustable, shock absorber	●	●	●	●	●	●	●	●	●	●
A2	L side full stroke, adjustable, shock absorber	●	●	●	●	●	●	●	●	●	●
A3	Full stroke adjustable, adjusting bracket to be added	●	●	●	●	●	●	●	●	●	●
Y	Floating fitting	●	●	●	●	●	●	●	●	●	●
Y1	Thin floating fitting	●	●	●	●	●	●	●	●	●	●
L*	Intermediate support bracket (for 00, LB)	●	●	●	●	●	●	●	●	●	●
N*	Intermediate support bracket (for LB1)	●	●	●	●	●	●	●	●	●	●
H	Larger thread for table installation	●	●	●	●	●	●	●	●	●	●
U	Height adjustment plate	●	●	●	●	●	●	●	●	●	●
Blank	:F (Standard)	●	●	●	●	●	●	●	●	●	●
R	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●
B	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●
T	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●
D	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●
S	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●
X	:R (Common port)	●	●	●	●	●	●	●	●	●	●
	:F	●	●	●	●	●	●	●	●	●	●

### Option selection table

● : Available    □ : Not available

Option	Option																	
	Code	A	A1	A2	A3	Y	Y1	L*	N*	H	U	Blank	R	B	T	D	S	X
		Both side full stroke length adjustable, with shock absorber	R side full stroke length adjustable, with shock absorber	L side full stroke length adjustable, with shock absorber	Full stroke length adjustable with adjusting bracket to be added later	Floating fitting	Thin floating fitting	Intermediate support bracket (for 00, LB)	Intermediate support bracket (for LB1)	Larger thread for table installation	Height adjustment plate	Port position F, cushion needle position F (standard)	Port position R, cushion needle position F (common port)	Port position F, cushion needle position B	Port position R, cushion needle position B (common port)	Port position D, cushion needle position F	Port position D, cushion needle position D	Port position F, cushion needle position F (common port)
A	●					●	●	●	●	●	●	●	●	●	●	●	●	●
A1		●				●	●	●	●	●	●	●	●	●	●	●	●	●
A2			●			●	●	●	●	●	●	●	●	●	●	●	●	●
A3				●		●	●	●	●	●	●	●	●	●	●	●	●	●
Y					●													●
Y1								●	●									
L*										●	●							
N*										●	●							
H												●	●	●	●	●	●	
U												●	●	●	●	●	●	●
Blank																		
R																		
B																		
T																		
D																		
S																		
X																		

Specifications for rechargeable battery (Catalog No. CC-1226A)

- Design compatible with rechargeable battery manufacturing process

**SRL3 - ..... - P4\***

\*1: Some combinations are not available depending on the bore size. Be sure to check the **H** Option in "How to order" on the previous page.  
 \*2: LB1 with port position D is not possible. (φ25, φ32)

### Theoretical thrust table

(Unit: N)

Bore size (mm)	Operating direction	Working pressure MPa							
		0.1	0.15	0.2	0.3	0.4	0.5	0.6	0.7
φ12	Push/Pull	-	-	27.7	41.5	55.3	69.1	83.0	96.8
φ16	Push/Pull	-	-	43.2	64.8	86.4	1.08 × 10 <sup>2</sup>	1.30 × 10 <sup>2</sup>	1.51 × 10 <sup>2</sup>
φ20	Push/Pull	-	-	62.9	94.4	1.26 × 10 <sup>2</sup>	1.57 × 10 <sup>2</sup>	1.89 × 10 <sup>2</sup>	2.20 × 10 <sup>2</sup>
φ25	Push/Pull	54.2	81.4	1.08 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.17 × 10 <sup>2</sup>	2.71 × 10 <sup>2</sup>	3.25 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>
φ32	Push/Pull	81.4	1.22 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.44 × 10 <sup>2</sup>	3.26 × 10 <sup>2</sup>	4.07 × 10 <sup>2</sup>	4.88 × 10 <sup>2</sup>	5.70 × 10 <sup>2</sup>
φ40	Push/Pull	1.27 × 10 <sup>2</sup>	1.90 × 10 <sup>2</sup>	2.53 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>	5.06 × 10 <sup>2</sup>	6.33 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	8.86 × 10 <sup>2</sup>
φ50	Push/Pull	1.99 × 10 <sup>2</sup>	2.98 × 10 <sup>2</sup>	3.98 × 10 <sup>2</sup>	5.96 × 10 <sup>2</sup>	7.95 × 10 <sup>2</sup>	9.94 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.39 × 10 <sup>3</sup>
φ63	Push/Pull	3.14 × 10 <sup>2</sup>	4.70 × 10 <sup>2</sup>	6.27 × 10 <sup>2</sup>	9.41 × 10 <sup>2</sup>	1.25 × 10 <sup>3</sup>	1.57 × 10 <sup>3</sup>	1.88 × 10 <sup>3</sup>	2.20 × 10 <sup>3</sup>
φ80	Push/Pull	5.06 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	1.01 × 10 <sup>3</sup>	1.52 × 10 <sup>3</sup>	2.03 × 10 <sup>3</sup>	2.53 × 10 <sup>3</sup>	3.04 × 10 <sup>3</sup>	3.54 × 10 <sup>3</sup>
φ100	Push/Pull	7.91 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.58 × 10 <sup>3</sup>	2.37 × 10 <sup>3</sup>	3.16 × 10 <sup>3</sup>	3.95 × 10 <sup>3</sup>	4.74 × 10 <sup>3</sup>	5.53 × 10 <sup>3</sup>

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

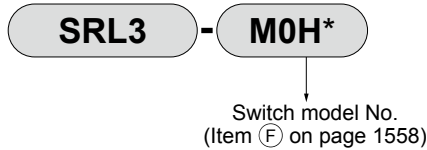
FK

Spd Contr

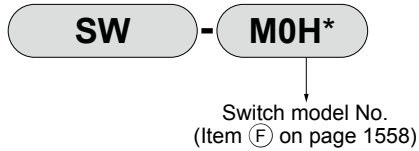
Ending

## How to order switch (For configurations, refer to pages 1606 to 1608)

- Switch body + mounting bracket set (\*1)



- Switch body only



* Lead wire length	
Blank	1 m (standard)
3	3 m (option)
5	5 m (option)

\* indicates lead wire length.

- Mounting bracket set (\*2)

· M type switch



· T type switch



- Lead wire holder (\*3)



\*1 : "Switch body + mounting bracket set" does not include lead wire holders.

Order lead wire holders separately if necessary.

\*2 : The mounting bracket is different between the M type switch and T type switch.

\*3 : The quantity of lead wire holders per set is 10.

- How to order discrete shock absorber



Bore size  
(Item ⑥ on page 1558)

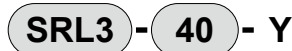
(One shock absorber, one shock absorber fixing hexagon nut)

(Note) The shock absorber fixing hexagon nut for SRL3-40 is a custom order product.

Applicable shock absorber model No.

Model	Shock absorber model No.
SRL3-12	NCK-00-0.3-C
SRL3-16	NCK-00-0.3-C
SRL3-20	NCK-00-0.7-C
SRL3-25	NCK-00-1.2
SRL3-32	NCK-00-2.6
SRL3-40	NCK-00-7
SRL3-50	NCK-00-12
SRL3-63	NCK-00-12
SRL3-80	NCK-00-20
SRL3-100	NCK-00-20

- How to order floating fitting set



Bore size  
(Item ⑥ on page 1558)

(Mount, mount base, pin, plain washer, pan head machine screw with spring washer, four mounting bolts)

- How to order discrete intermediate support bracket

For 00/LB



Bore size  
(Item ⑥ on page 1558)

For LB1



Bore size  
(Item ⑥ on page 1558)

- How to order full stroke length adjusting bracket kit



Bore size  
(Item ⑥ on page 1558)

(For configurations, refer to "Full stroke length adjusting bracket kit" on page 1607.)

- How to order repair parts



Bore size (Item ⑥ on page 1558)      Stroke length (Item ⑤ on page 1558)

- How to order mounting bracket



Mounting (Item ① on page 1558)      Bore size (Item ⑥ on page 1558)  
(Bracket x2, mounting bolt x4)

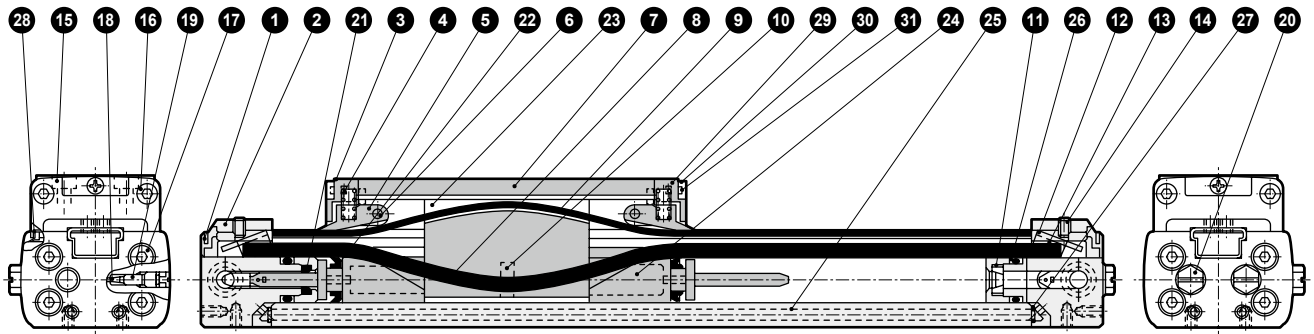
- How to order height adjustment plate set



Bore size  
(Item ⑥ on page 1558)  
(Plate, mounting bolt x4)

### Internal structure and parts list

● φ12 to φ40 equiv.



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Belt cover	Polyamide		18	Needle gasket	Nitrile rubber	
2	Cover (L)	Aluminum alloy	Baking finish	19	Cushion needle	Steel	Zinc chromate
3	Table cover	Polyacetal resin		20	Plug (φ12, φ16)	Copper alloy	Nickeling
4	Spring	Steel	Black finish		Plug (φ20 to φ40)	Steel	Zinc chromate
5	Belt holder	Polyacetal resin		21	Cushion packing	Urethane rubber	
6	Parallel pin (φ12 to φ20)	Stainless steel		22	Piston packing	Nitrile rubber	
	Shaft (φ25 to φ40)	Steel	Zinc chromate	23	Yoke	Aluminum alloy	Alumite
7	Table	Aluminum alloy	Alumite	24	Piston	Polyacetal resin	
8	Seal belt	Urethane rubber		25	Cylinder tube	Aluminum alloy	Alumite
9	Dust-proof belt	Stainless steel + nitrile rubber		26	Cylinder gasket	Nitrile rubber	
10	Magnet	Special alloy	Nickeling	27	O-ring for common port	Nitrile rubber	
11	Cushion adaptor	Polyacetal resin		28	Dust wiper	Polyacetal resin	
12	Cover (R)	Aluminum alloy	Baking finish	29	Double-sided tape		
13	Belt spacer	Steel	Zinc chromate	30	Plate	Stainless steel (φ12 to φ20)	
14	Hexagon socket set screw	Alloy steel	Zinc chromate			Alloy steel (φ25 to φ40)	Zinc chromate
15	Hexagon socket head cap screw	Alloy steel	Zinc chromate	31	Cross-recessed tapping screw	Stainless steel	
16	Hexagon socket head cap screw	Stainless steel					
17	Hexagon socket head cap screw	Alloy steel	Zinc chromate				

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ12 or equiv.	SRL3-12K-*	
φ16 or equiv.	SRL3-16K-*	
φ20 or equiv.	SRL3-20K-*	8 9 18 21
φ25 or equiv.	SRL3-25K-*	22 26 27 28
φ32 or equiv.	SRL3-32K-*	
φ40 or equiv.	SRL3-40K-*	

Note: Specify the kit No. when placing an order.  
Specify the stroke length for \*.

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

SRL3

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

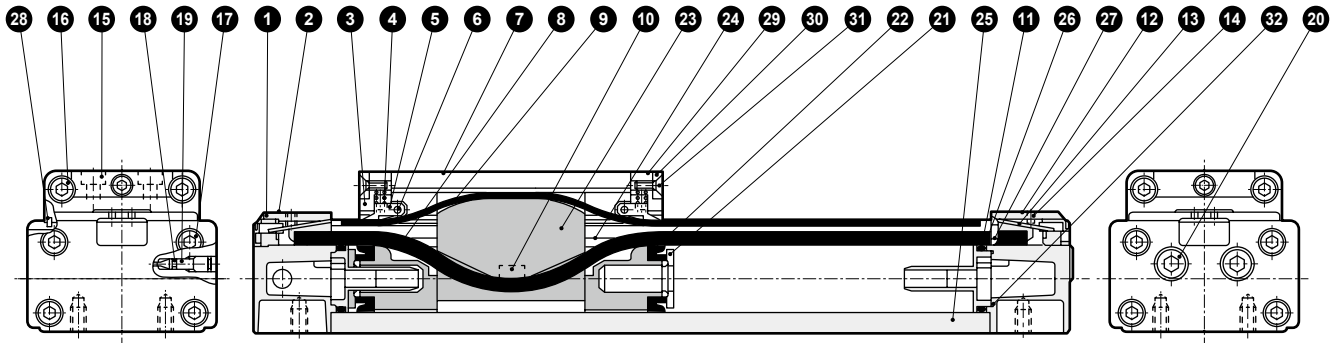
FK

Spd  
Contr

Ending

## Internal structure and parts list

● φ50 to φ63 or equiv.



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Belt cover	Polyamide		17	Hexagon socket head cap screw	Alloy steel	Zinc chromate
2	Cover (L)	Aluminum alloy	Baking finish	18	Needle gasket	Nitrile rubber	
3	Table cover	Polyacetal resin		19	Cushion needle	Steel	Zinc chromate
4	Spring	Steel	Black finish	20	Plug	Steel	Zinc chromate
5	Belt holder	Polyacetal resin		21	Cushion packing	Urethane rubber	
6	Shaft	Steel	Zinc chromate	22	Piston packing	Nitrile rubber	
7	Table	Aluminum alloy	Alumite	23	Yoke	Aluminum alloy	Alumite
8	Seal belt	Urethane rubber		24	Piston	Polyacetal resin	
9	Dust-proof belt	Stainless steel + nitrile rubber		25	Cylinder tube	Aluminum alloy	Alumite
10	Magnet	Special alloy	Nickeling	26	Cylinder gasket	Nitrile rubber	
11	Cushion ring	Polyacetal resin		27	O-ring for common port	Nitrile rubber	
12	Cover (R)	Aluminum alloy	Baking finish	28	Dust wiper	Polyacetal resin	
13	Belt spacer	Steel	Zinc chromate	29	Double-sided tape		
14	Hexagon socket set screw	Alloy steel	Zinc chromate	30	Plate	Alloy steel	Zinc chromate
15	Hexagon socket head cap screw	Alloy steel	Zinc chromate	31	Cross-recessed tapping screw	Stainless steel	
16	Hexagon socket head cap screw	Stainless steel		32	Cushion ring gasket	Nitrile rubber	

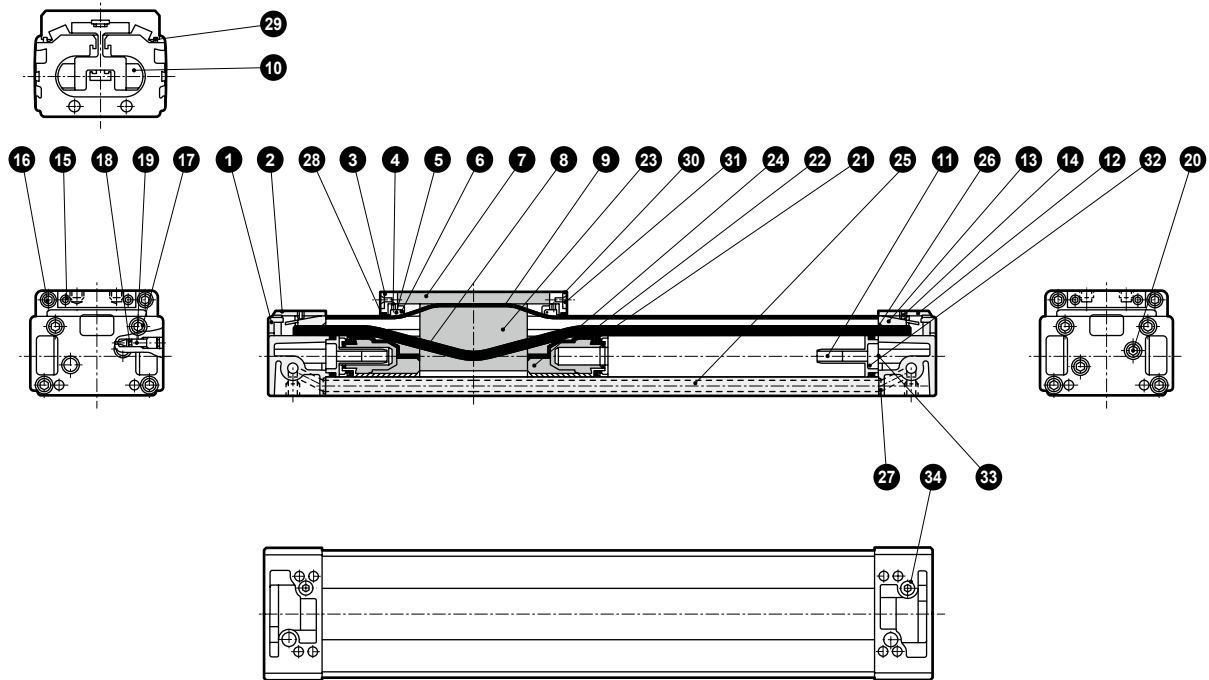
### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ50 or equiv.	SRL3-50K-*	8 9 18 21 22
φ63 or equiv.	SRL3-63K-*	26 27 28 32

Note: Specify the kit No. when placing an order. Specify the stroke length for \*.

### Internal structure and parts list

● φ80 to φ100 or equiv.



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Belt cover	Polyamide		18	Needle gasket	Nitrile rubber	
2	Cover (L)	Aluminum alloy	Baking finish	19	Cushion needle	Steel	Zinc chromate
3	Table cover	Polyacetal resin		20	Plug	Steel	Zinc chromate
4	Spring	Steel	Black finish	21	Cushion packing	Urethane rubber	
5	Belt holder	Polyacetal resin		22	Piston packing	Nitrile rubber	
6	Shaft	Steel	Zinc chromate	23	Yoke	Aluminum alloy	Alumite
7	Table	Aluminum alloy	Alumite	24	Piston	Polyacetal resin	
8	Seal belt	Urethane rubber		25	Cylinder tube	Aluminum alloy	Alumite
9	Dust-proof belt	Stainless steel + nitrile rubber		26	Cylinder gasket	Nitrile rubber	
10	Magnet	Special alloy	Nickeling	27	O-ring for common port	Nitrile rubber	
11	Cushion ring	Polyacetal resin		28	Felt (1)	Wool	
12	Cover (R)	Aluminum alloy	Baking finish	29	Felt (2)	Wool	
13	Belt spacer	Steel	Zinc chromate	30	Plate	Alloy steel	Zinc chromate
14	Hexagon socket set screw	Alloy steel	Zinc chromate	31	Cross-recessed tapping screw	Stainless steel	
15	Hexagon socket head cap screw	Alloy steel	Zinc chromate	32	Cushion ring gasket (1)	Nitrile rubber	
16	Hexagon socket head cap screw	Stainless steel		33	Cushion ring gasket (2)	Nitrile rubber	
17	Hexagon socket head cap screw	Alloy steel	Zinc chromate	34	Plug	Steel	Zinc chromate

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ80 or equiv.	SRL3-80K-*	8 9 18 21 22 26
φ100 or equiv.	SRL3-100K-*	27 28 29 32 33

Note: Specify the kit No. when placing an order. Specify the stroke length for \*.

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd  
Contr

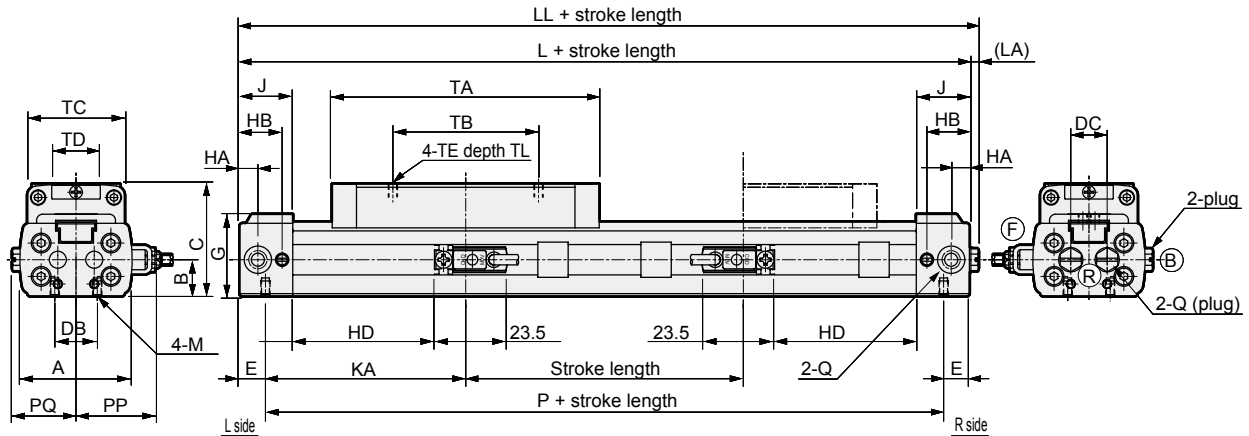
Ending



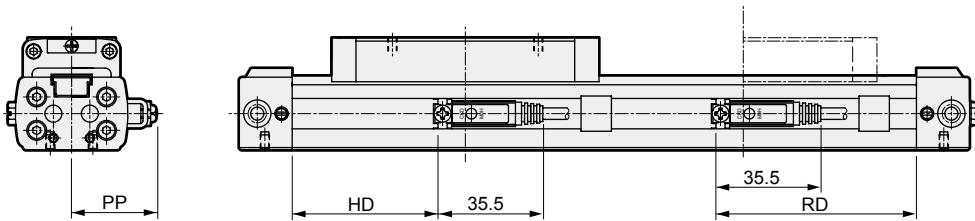
# SRL3 Series

## Dimensions (φ12 to φ20 equiv.)

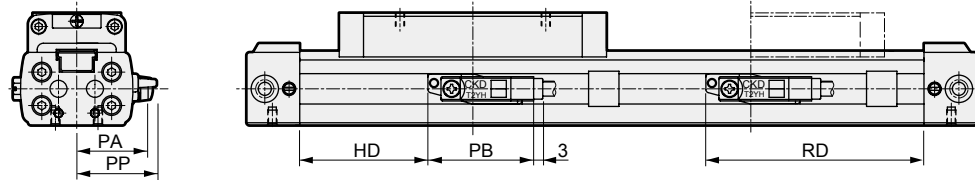
● With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-M\*V\* (lead wire L-shaped)



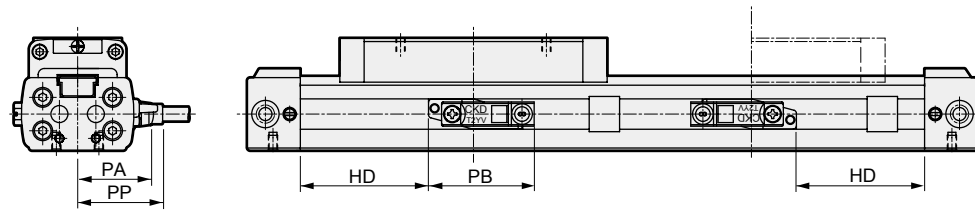
● With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-M\*H\* (lead wire straight)



● With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-T\*H\* (T\*W, T\*Y, T2YD)



● With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-T\*V\* (T\*W, T\*Y)



RD: Max. sensitivity installation position HD: Max. sensitivity installation position

Code	A	B	C	DB	DC	E	G	HA	HB	J	KA	L	LL	LA	M	P	PQ	Q	TA	TB	TC	TD	TE	
SM-25																								
ShkAbs	Bore size (mm)																							
	φ12 or equiv.	33	10.5	33	10	11	8.5	24	6	14	17.5	59.5	136	139	3	M3 depth 5	119	19	M5	81	42	29	13	M3 depth 5
	φ16 or equiv.	37	12	37	14	12	8.5	27	6	14	17.5	66	149	152	3	M3 depth 5	132	21	M5	88	48	32	15	M3 depth 5
FJ	φ20 or equiv.	44	14	42	16	16	10.5	31	8.5	18.5	22	74	169	171.5	2.5	M4 depth 6.5	148	24.5	Rc1/8	100	60	38	18	M4 depth 6

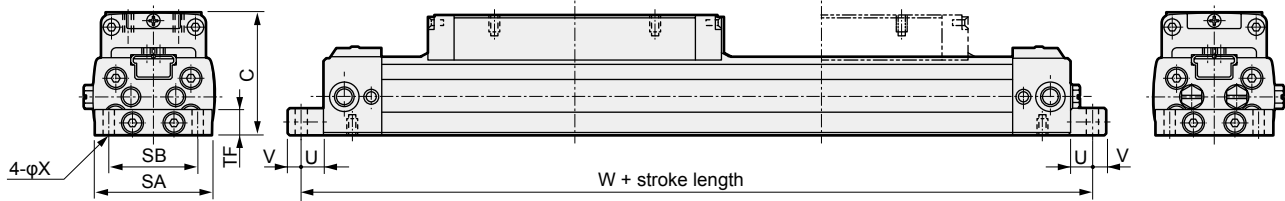
Code	With switch																	
	HD			RD			PA	PB			PP							
	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV	T*WH	
Spd Contr	φ12 or equiv.	40.5	36	32	60.5	65	69	24.3	35	34	33.5	24.5	24.5	26	23	28.4	20.7	17.2
	φ16 or equiv.	47	42	38	67	72	76	26.3	35	34	33.5	26.5	26.5	28	25	30.4	22.7	19.2
	φ20 or equiv.	52.5	48	44	72.5	77	81	29.3	35	34	33.5	29.5	29.5	31	28	33.4	25.7	22.2

\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

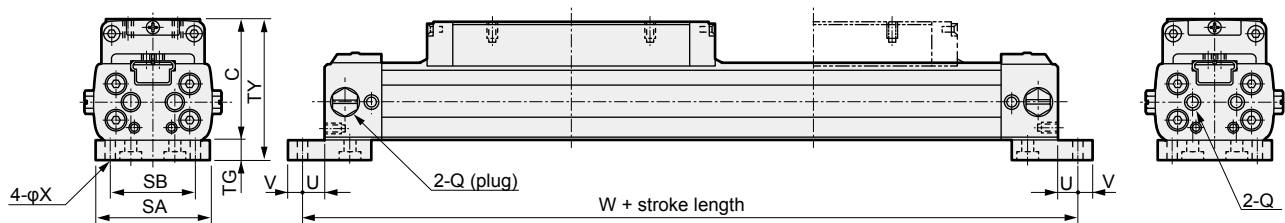
## Dimensions (φ12 to φ20 equiv.)



- With foot bracket SRL3-LB-12 to 20



- With foot bracket SRL3-LB1-12 to 20



Code	With foot bracket (LB)							With foot bracket (LB1)							
	SA	SB	TF	U	V	W	X	SA	SB	TG	TY	U	V	W	X
φ12 or equiv.	32	24	8	6	4	148	3.4	32	24	6	39	6	4	148	3.4
φ16 or equiv.	35	26	8	6	4	161	3.4	35	26	6	43	6	4	161	3.4
φ20 or equiv.	43	33	10	6	6	181	4.5	43	33	8	50	6	6	181	4.5

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

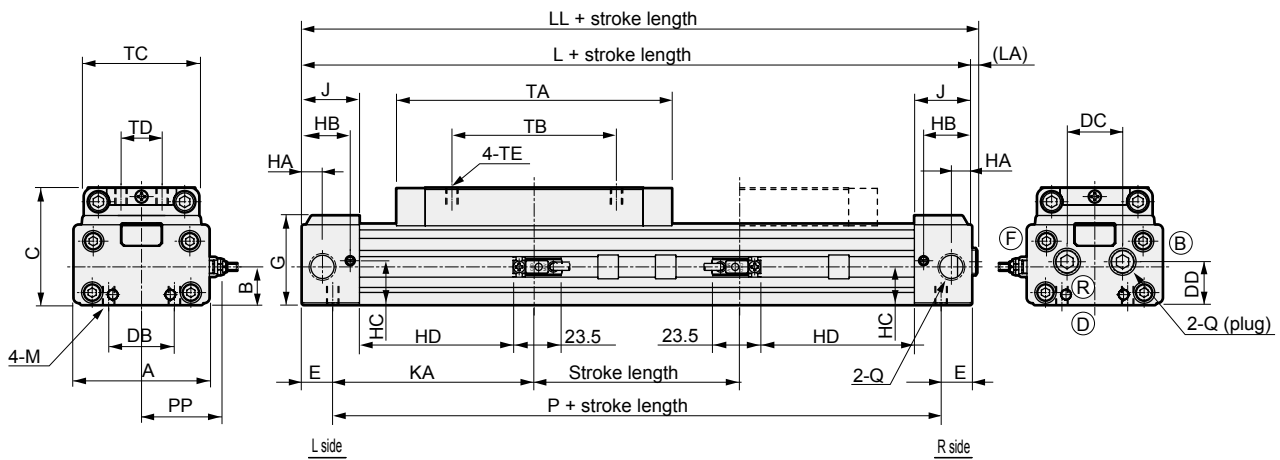
Spd  
Contr

Ending

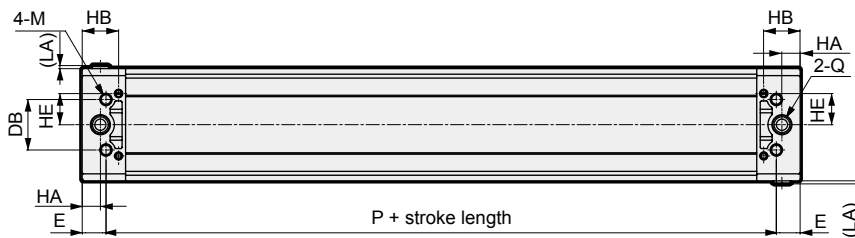
# SRL3 Series

## Dimensions (φ25 to φ63 equiv.)

● With cylinder switch SRL3-\*\*-\*\*-\*\*\*-M\*V\* (lead wire L-shaped)



● Bottom piping (option code: D/S)



Code	A	B	C	DB	DC	DD	E	G	HA	HB	HC	HE	J	KA	L	LL	LA	M	P	Q	TA	TB	TC	TD	TE
φ25 or equiv.	53	17	53	20	26	19	14	40.5	7.5	20	18.9	-	24	81	190	192	2	M6 depth 9	162	Rc1/8	122	70	48	20	M5 depth 6
φ32 or equiv.	66	18.5	57	32	27	21	15	43.5	10	23.5	21.5	17	28	98	226	228.5	2.5	M6 depth 9	196	Rc1/4	134	80	56	20	M6 depth 7.5
φ40 or equiv.	80	22	67	36	35	28	17	51.5	13	26	27	22.3	31	105	244	246.5	2.5	M8 depth 12	210	Rc1/4	148	90	68	30	M6 depth 9
φ50 or equiv.	96	28	82	45	35	35	23	61	15	33	35.3	11	39	106	258	260.5	2.5	M8 depth 12	212	Rc3/8	152	100	80	30	M8 depth 10.5
φ63 or equiv.	118	35	95	50	39	42	19	74	15	32	43	31	39	129	296	298.5	2.5	M10 depth 15	258	Rc3/8	168	110	102	40	M8 depth 11.5

Code	With switch															
	HD			RD			PA	PB			PP					
Bore size (mm)	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV
φ25 or equiv.	60	56	52	82	86	90	34.3	35	34	33.5	34.5	34	33	38.4	30.7	27.2
φ32 or equiv.	74	70	66	96	100	104	41.3	35	34	33.5	41.5	41.5	40	45.4	37.7	34.2
φ40 or equiv.	80	76	72	102	106	110	48.3	35	34	33.5	48.5	50	47	52.4	44.7	41.2
φ50 or equiv.	79	75	71	101	105	109	56.3	35	34	33.5	56.5	58	55	60.4	52.7	49.2
φ63 or equiv.	98	94	90	120	124	128	67.3	35	34	33.5	67.5	69	66	71.4	63.7	60.2

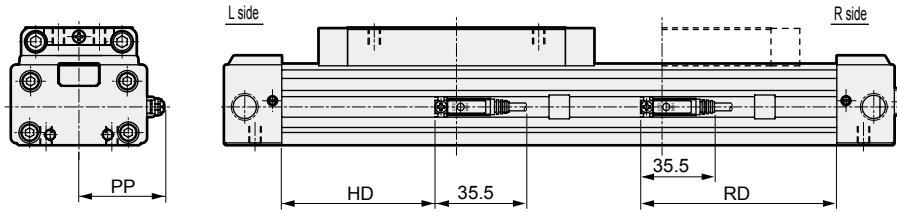
\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

\*2: Option S is not available for φ25.

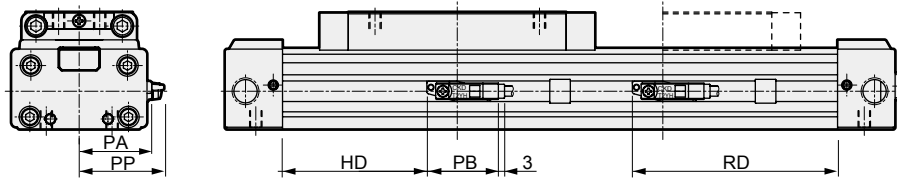
## Dimensions (φ25 to φ63 equiv.)



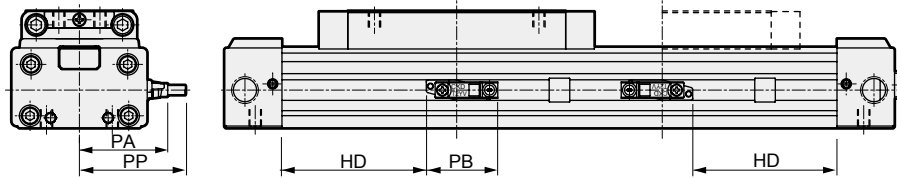
- With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-M\*H\* (lead wire straight)



- With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-T\*H (T\*W, T\*Y, T2YD)

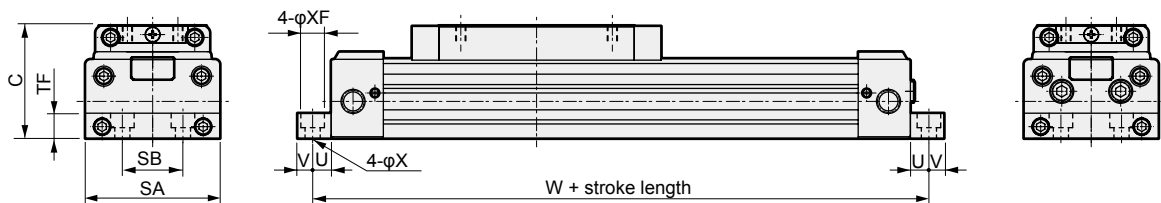


- With cylinder switch SRL3-\*\*-\*\*\*-\*\*\*-T\*V (T\*W, T\*Y)

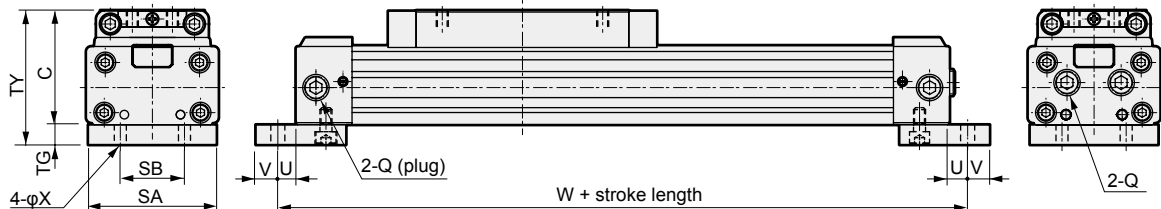


RD: Max. sensitivity installation position HD: Max. sensitivity installation position

- With foot bracket SRL3-LB-25 to 63



- With foot bracket SRL3-LB1-25, 32 (The mounting LB1 is not available for φ40 to φ63 or equiv.)



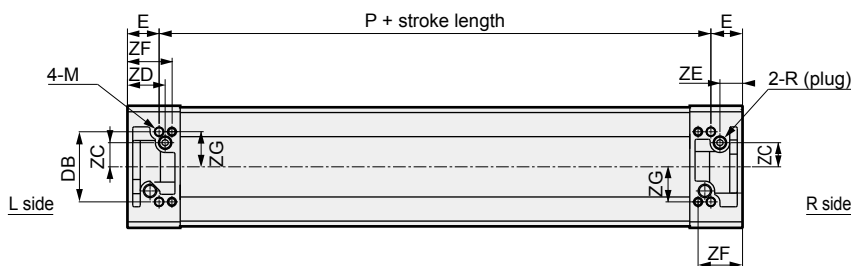
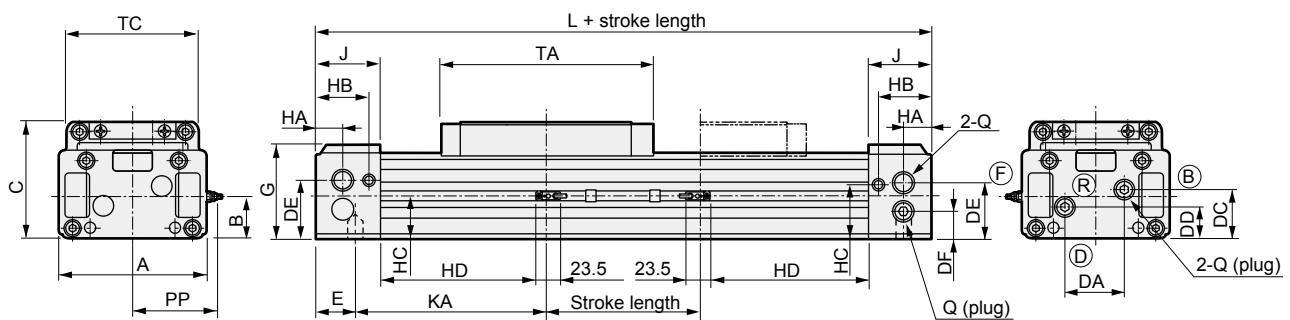
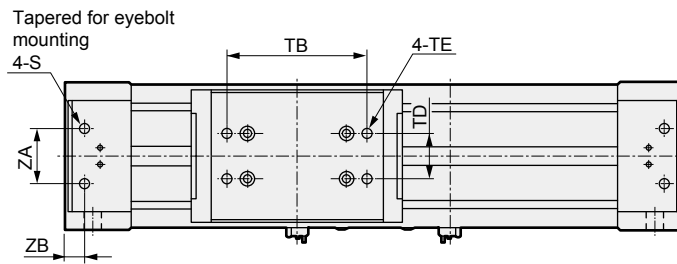
Code	With foot bracket (LB)								With foot bracket (LB1)							
	SA	SB	TF	U	V	W	X	XF	SA	SB	TG	TY	U	V	W	X
φ25 or equiv.	52	20	12	9	11	208	7	-	50	20	10	63	9	11	208	7
φ32 or equiv.	64	32	12	9	11	244	7	-	64	32	10	67	9	11	244	7
φ40 or equiv.	80	36	15	11	9	266	9	14 spot face depth 8.6	-	-	-	-	-	-	-	-
φ50 or equiv.	94	45	20	11	9	280	9	14 spot face depth 8.6	-	-	-	-	-	-	-	-
φ63 or equiv.	116	50	25	13	12	322	11	17.5 spot face depth 10.8	-	-	-	-	-	-	-	-

- SCP\*3
- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/COVP/N2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/MSDG
- FC\*
- STK
- SRL3**
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd Contr
- Ending

# SRL3 Series

## Dimensions (φ80 to φ100 equiv.)

● With cylinder switch SRL3-\*\*-\*\*-\*\*\*-M\*V\* (lead wire L-shaped)



Code	A	B	C	DA	DB	DC	DD	DE	DF	E	G	HA	HB	HC	J	KA	L	M	P	Q	R	S
φ80 or equiv.	162	49	130	64	93	58	38	65	33	42	106	30	59	64.5	70	208	500	M12 depth 18	416	Rc1/2	Rc3/8	M12 depth 23
φ100 or equiv.	198	61.5	150	73	108	71.5	47.5	81.5	41.5	43	125	30	69	76.5	80	222	530	M12 depth 18	444	Rc1/2	Rc1/2	M12 depth 23

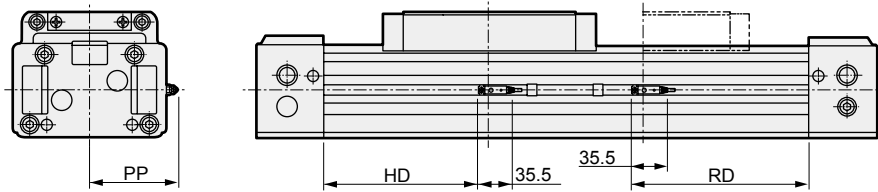
Code	TA	TB	TC	TD	TE	ZA	ZB	ZC	ZD	ZE	ZF	ZG	With foot bracket						
													SA	SB	TF	U	V	W	X
φ80 or equiv.	228	150	146	50	M12 depth 15	60	21	32	50	30	59	46.5	162	134	25	13	12	526	14
φ100 or equiv.	238	160	170	60	M12 depth 15	60	21	36.5	55	30	69	54	198	160	30	15	15	560	14

\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

## Dimensions (φ80 to φ100 equiv.)

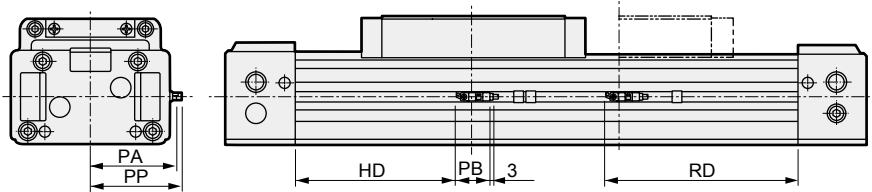


- With cylinder switch SRL3-\*\*-\*\*\*-M\*H\* (lead wire straight)

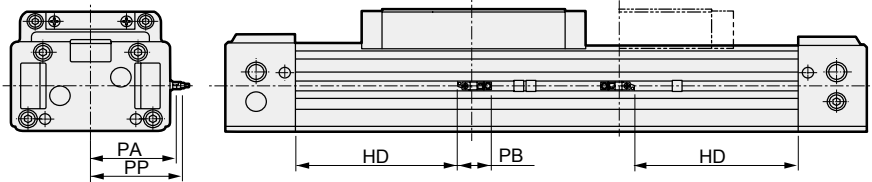


RD: Max. sensitivity mounting position  
HD: Max. sensitivity mounting position

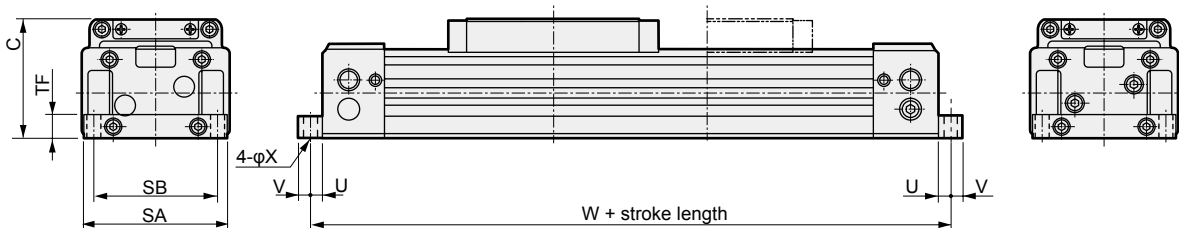
- With cylinder switch SRL3-\*\*-\*\*\*-T\*H (T\*W, T\*Y, T2YD)



- With cylinder switch SRL3-\*\*-\*\*\*-T\*V (T\*W, T\*Y)



- With foot bracket SRL3-LB-\*\*-\*\*\*



Code	With switch																
	HD			RD			PA	PB			PP						
	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV	T*WH
φ80 or equiv.	170	165	161	190	195	199	87.3	35	34	33.5	87.5	87.5	89	86	91.4	83.7	80.2
φ100 or equiv.	175	170	166	195	200	204	105.3	35	34	33.5	105.5	105.5	107	104	109.4	101.7	98.2

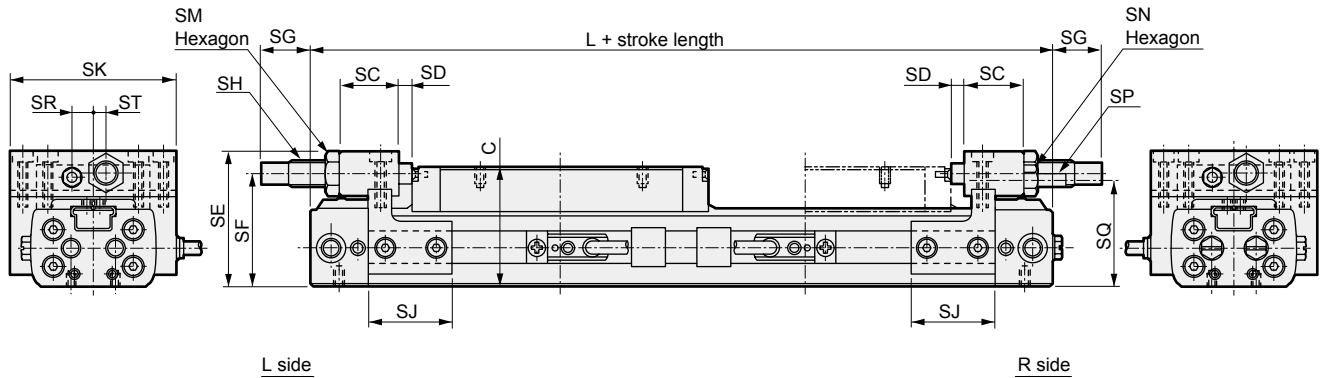
- SCP\*3
- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/COVP/N2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/MSDG
- FC\*
- STK
- SRL3**
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd Contr
- Ending

# SRL3 Series

## SRL3 Series common dimensions

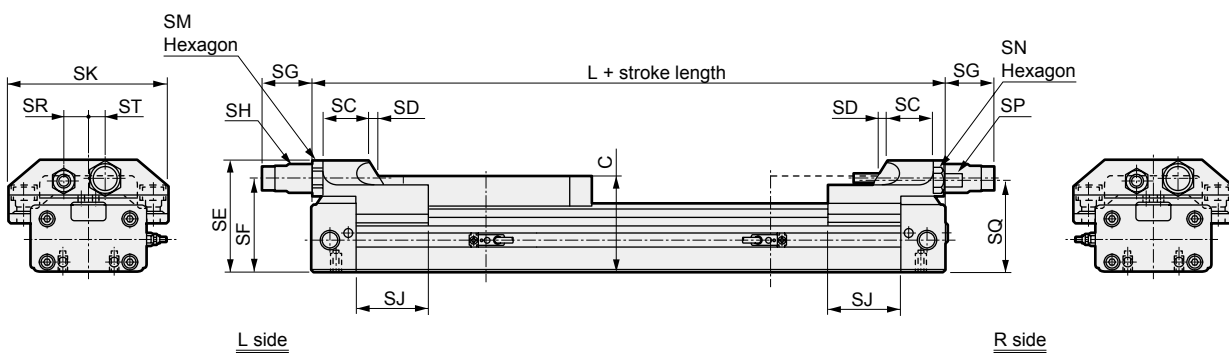
● Full stroke length adjustable with shock absorber (SRL3)

·  $\phi 12$  to  $\phi 25$  or equiv.



Code	SC	SD	SE	SF	SG			SH		SJ	SK	SM	SN	SP	SQ	SR	ST	C	L	
					At max.	At min.	Adj. range	Thread size	Max. absorbed energy (J)											
SSD2	Bore size (mm)																			
SSG	$\phi 12$ or equiv.	19.5	2.5	40	32	17.5	7.5	10	M8×0.75	3	25	45	12	5.5	M3	30.5	6	3	33	136
SSD	$\phi 16$ or equiv.	18	4	42	35	14.5	4.5	10	M8×0.75	3	25	49	12	5.5	M3	34	6	4	37	149
CAT	$\phi 20$ or equiv.	22.5	3.5	48	40	14.5	4.5	10	M10×1.0	7	39	57	14	7	M4	38	8	5	42	169
MDC2	$\phi 25$ or equiv.	20	2.5	62.5	51.5	14.5	4.5	10	M12×1.0	12	50	77	17	10	M6	50	12	10	53	190

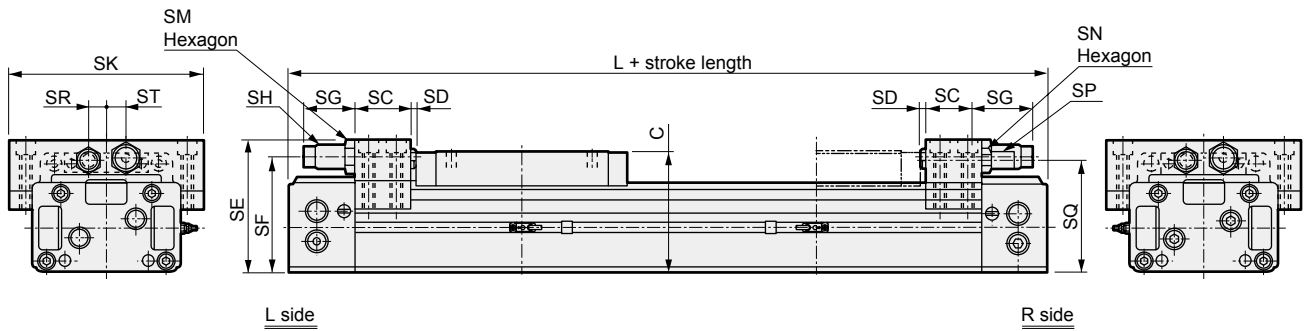
·  $\phi 32$  to  $\phi 63$  or equiv.



Code	SC	SD	SE	SF	SG			SH		SJ	SK	SM	SN	SP	SQ	SR	ST	C	L	
					At max.	At min.	Adj. range	Thread size	Max. absorbed energy (J)											
SM-25	$\phi 32$ or equiv.	22	7	66.5	55.5	27	17	10	M14×1.5	26	46	98	19	13	M8	53.5	14	12	57	226
ShkAbs	$\phi 40$ or equiv.	32	7	78.5	65.5	34	24	10	M20×1.5	70	51	112	24	17	M10	63.5	17	12	67	244
FJ	$\phi 50$ or equiv.	38	8	99	80	55	45	10	M25×1.5	120	53	136	32	19	M12	77.5	22	17	82	258
FK	$\phi 63$ or equiv.	38	8	112	93.5	44	34	10	M25×1.5	120	64	158	32	24	M16	89	25	20	95	296

## SRL3 Series common dimensions

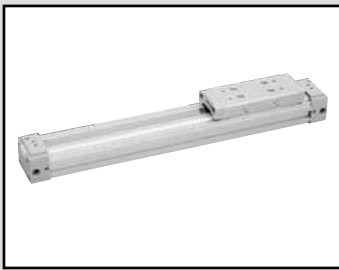
- Full stroke length adjustable with shock absorber
  - $\phi 80$ ,  $\phi 100$  or equiv.



Code	SC	SD	SE	SF	SG			SH		SK	SM	SN	SP	SQ	SR	ST	C	L
					At max.	At min.	Adj. range	Thread size	Max. absorbed energy (J)									
$\phi 80$ or equiv.	60	6	145	125.5	50	40	10	M27×1.5	200	214	32	27	M20	123	20	20	130	500
$\phi 100$ or equiv.	60	6	164	144.5	50	40	10	M27×1.5	200	250	32	27	M20	142	20	20	150	530

- SCP\*3
- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/COVP/N2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/MSDG
- FC\*
- STK
- SRL3**
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd Contr
- Ending

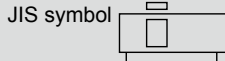




Rodless cylinder resin guide

# SRL3-G Series

- Bore size:  $\phi 12$ ,  $\phi 16$ ,  $\phi 20$ ,  $\phi 25$ ,  $\phi 32$ ,  $\phi 40$ ,  $\phi 50$ ,  $\phi 63$ ,  $\phi 80$ ,  $\phi 100$



## Specifications

Descriptions	SRL3-G											
	Bore size	mm	$\phi 12$	$\phi 16$	$\phi 20$	$\phi 25$	$\phi 32$	$\phi 40$	$\phi 50$	$\phi 63$	$\phi 80$	$\phi 100$
Actuation	Double acting											
Working fluid	Compressed air											
Max. working pressure	MPa	0.7 ( $\approx 100$ psi, 7 bar)										
Min. working pressure	MPa	0.25 ( $\approx 36$ psi, 2.5 bar)			0.15 ( $\approx 22$ psi, 1.5 bar)				0.1 ( $\approx 15$ psi, 1 bar)			
Proof pressure	MPa	1.05 ( $\approx 150$ psi, 10.5 bar)										
Ambient temperature	$^{\circ}\text{C}$	5 (41 $^{\circ}\text{F}$ ) to 60 (140 $^{\circ}\text{F}$ )										
Port size		M5		Rc1/8		Rc1/4		Rc3/8		Rc1/2		
Stroke tolerance	mm	$^{+2.0}_0$ (to 1000), $^{+2.5}_0$ (to 3000), $^{+3.0}_0$ (to 5000)										
Working piston speed	mm/s	50 to 2000 (standard piping) (*1)										
Cushion		Air cushion										
Lubrication		Not required (use turbine oil class 1 ISO VG32 if necessary for lubrication. Once lubricated, the cylinder will need periodic lubrication.)										

\*1: For common port piping, the working piston speed varies depending on the stroke length. Contact CKD.

## Allowable absorbed energy

Bore size (mm)	Cushioned		Without cushion	With shock absorber (initial set point)	
	Max absorbed energy (J)	Cushion stroke (mm)	Max absorbed energy (J)	Absorbed energy (J)	Effective stroke (mm)
$\phi 12$ or equiv.	0.03	14.5	0.003	2.4	5.5
$\phi 16$ or equiv.	0.22	19.2	0.007	2.4	5.5
$\phi 20$ or equiv.	0.59	22.2	0.010	5.7	7
$\phi 25$ or equiv.	1.40	20.9	0.015	10	9
$\phi 32$ or equiv.	2.57	23.5	0.030	18	13
$\phi 40$ or equiv.	4.27	23.9	0.050	50	16.5
$\phi 50$ or equiv.	9.13	24.9	0.072	86	21
$\phi 63$ or equiv.	17.4	29.6	0.138	86	21
$\phi 80$ or equiv.	40	45.8	0.393	143	25
$\phi 100$ or equiv.	67	45.8	0.622	143	25

## Stroke length

Bore size (mm)	Standard stroke length (mm)	Max. stroke length (mm)	Min. stroke length (mm)
$\phi 12$ equiv.	200/300 400/500 600/700 800/900 1000	5000	1
$\phi 16$ equiv.			
$\phi 20$ equiv.			
$\phi 25$ equiv.			
$\phi 32$ equiv.			
$\phi 40$ equiv.			
$\phi 50$ equiv.			
$\phi 63$ equiv.			
$\phi 80$ equiv.			
$\phi 100$ equiv.			

## Number of installed M type switches and min. stroke length (mm)

\* The custom stroke length is available in 1 mm increments.

Switch quantity	1		2		3		4		5		6	
	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 16$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 20$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 25$ or equiv.	10	10	30	45(70)	60	90(120)	90	135(170)	120	180(220)	150	225(270)
$\phi 32$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 40$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 50$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 63$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 80$ or equiv.	25		50		100		150		200		250	
$\phi 100$ or equiv.	25		50		100		150		200		250	

Note: Values in ( ) are the min. stroke length with switch of the full stroke length adjustable.

## Number of installed T switches and min. stroke length (mm)

Switch quantity	1		2		3		4		5		6	
	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 16$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 20$ or equiv.	5	5	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 25$ or equiv.	10	10	45	50(70)	85	100(120)	125	150(170)	165	200(220)	205	250(270)
$\phi 32$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 40$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 50$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 63$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 80$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250
$\phi 100$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250

Note: Values in ( ) are the min. stroke length with switch of the full stroke length adjustable.

## Switch specifications (M type switch)

● 1-color/2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire		
	M2V,M2H	M2WV (2-color display)	M3H/M3V	M3PH/M3PV (custom order)	M3WV
Applications	Dedicated for programmable controller		For programmable controller, relay, IC circuit, compact solenoid valve		
Output method	-		NPN output	PNP output	NPN output
Power supply voltage	-		4.5 to 28 VDC		10 to 28 VDC
Load voltage	10 to 30 VDC		30 VDC or less		
Load current	5 to 30 mA		100 mA or less	100 mA or less	100 mA or less
Indicator lamp	LED (Lit when ON)	Red/green LED (Lit when ON)	LED (Lit when ON)	Yellow LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 μA or less	0.05 mA or less	10 μA or less
Weight	g 1 m:22 3 m:57 5 m:93				

Descriptions	Reed 2-wire			
	M0V,M0H		M5V,M5H	
Applications	For programmable controller, relay		For programmable controller, relay, IC circuit (without indicator lamp), serial connection	
Power supply voltage	-		-	
Load voltage	12/24 VDC	110 VAC	5/12/24 VDC	
Load current	5 to 50 mA	7 to 20 mA	50 mA or less	
Indicator lamp	LED (Lit when ON)		Without indicator lamp	
Leakage current	0 mA			
Weight	g 1 m:22 3 m:57 5 m:93			

\*1 : M0\* switch can be used for 24 VAC and 48 VAC within load current range of 7 to 20 mA.

\*2 : Refer to Ending Page 1 for other switch specifications.

\*3 : Dimensions depend on switch model No. Refer to Ending Page 13 for details.

## Switch specifications (T type switch)

● 2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire	
	T2YH/T2YV	T2WH/T2WV	T3YH/T3YV	T3WH/T3WV
Applications	Dedicated for programmable controller		For programmable controller, relay	
Output method	-		NPN output	NPN output
Power supply voltage	-		10 to 28 VDC	
Load voltage	10 to 30 VDC	24 VDC ±10%	30 VDC or less	
Load current	5 to 20 mA (*1)		50 mA or less	
Indicator lamp	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 μA or less	
Weight	g 1 m:33 3 m:87 5 m:142		1 m:18 3 m:49 5 m:80	

● For AC magnetic field

Descriptions	Proximity 2-wire		
	T2YD,T2YDT		
Applications	Dedicated for programmable controller		
Indicator lamp	Red/green LED (Lit when ON)		
Load voltage	24 VDC ±10%		
Load current	5 to 20 mA		
Internal voltage drop	6V or less		
Leakage current	1.0 mA or less		
Weight	g 1 m:61 3 m:166 5 m:272		

Note: This switch cannot be used in DC magnetic field.

## Cylinder weight

Unit: kg

Bore size (mm)	Weight for 0 mm stroke length			Switch weight	Mounting bracket weight		Additional weight per St = 100mm
	Basic (00)	Foot			T type	M type	
		(LB)	(LB1)				
φ12 or equiv.	0.24	0.25	0.26	Refer to the weight in the switch specifications.	0.005	0.001	0.10
φ16 or equiv.	0.32	0.33	0.35				0.13
φ20 or equiv.	0.52	0.54	0.58				0.18
φ25 or equiv.	1.0	1.1	1.1				0.28
φ32 or equiv.	1.5	1.6	1.7				0.36
φ40 or equiv.	2.4	2.5	-				0.53
φ50 or equiv.	3.5	3.6	-				0.75
φ63 or equiv.	6.1	6.4	-				1.11
φ80 or equiv.	18.8	19.4	-				2.32
φ100 or equiv.	26.6	27.6	-				3.38

SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVP/N2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

# SRL3-G Series

## How to order

Without switch (built-in magnet for switch)

**SRL3-G-00-12-B-200-B**

With switch (built-in magnet for switch)

**SRL3-G-00-12-B-200-M0H-R-B**

**A** Mounting  
\*1, \*2

**B** Bore size

**C** Port thread

**D** Cushion

**E** Stroke length

**F** Switch model No.

### Note on model No. selection

\*1 : Mounting bracket will be shipped assembled with the product.

\*2 : For 12, 16, 20, 25 and 32 bore sizes with option code "R" or "T", the mounting will be "00" or "LB1".  
(Piping with mounting "LB" is not possible for option codes "R" and "T".)

\*3 : Refer to page 1572 for the min. stroke length with switch.

\*4 : Switches other than **F** Switch model No. are also available. (Custom order) Refer to Ending Page 1 for details.

\*5 : "\*" of L\* and N\* indicates the number of sets. When more than one set are necessary, specify "L2" (for LB) or "N2" (for LB1).  
2 pcs./set

\*6 : For the port and cushion needle position codes, refer to dimensions on pages 1580 to 1584.

\*7 : In the case of the standard with  $\phi 12$  to  $\phi 25$ , remove the cover, attach a flat nut and install the full stroke length adjusting bracket.  
A flat nut is attached to option "A3" to enable retrofitting the full stroke length adjusting bracket without removing the cover.

\*8 : In "H", the thread size for  $\phi 12$  and  $\phi 16$  will be "M4" and that for  $\phi 20$  will be "M5".

\*9 : Check the option combinations in "Option selection table".

\*10 : Copper and PTFE free as standard. (except for type with shock absorber)

[Example of model No.]

**SRL3-G-00-12B-200-M0H-R-B**

Model: Rodless cylinder resin guide type

- A** Mounting : Basic
- B** Bore size :  $\phi 12$  mm
- C** Port thread : Rc thread
- D** Cushion : Both sides cushioned
- E** Stroke length : 200 mm
- F** Switch model No. : Reed M0H switch, lead wire 1 m
- G** Switch quantity : 1 on R side
- H** Option : Port position F, cushion needle position B

Code	Content												
<b>A Mounting</b>													
00	Basic												
LB	Axial foot												
LB1	Axial foot ( $\phi 12$ to $\phi 32$ only)												
<b>B Bore size (mm)</b>													
12	$\phi 12$												
16	$\phi 16$												
20	$\phi 20$												
25	$\phi 25$												
32	$\phi 32$												
40	$\phi 40$												
50	$\phi 50$												
63	$\phi 63$												
80	$\phi 80$												
100	$\phi 100$												
<b>C Port thread</b>													
Blank	Rc thread												
N	NPT thread ( $\phi 20$ or more) (custom order product)												
G	G thread ( $\phi 20$ or more) (custom order product)												
<b>D Cushion</b>													
B	Both sides cushioned												
R	R side cushioned												
L	L side cushioned												
N	Without cushion												
<b>E Stroke length (mm)</b>													
Bore size	Stroke length *3	Custom stroke length											
$\phi 12$ to $\phi 100$	1 to 5000	In 1 mm increments											
<b>F Switch model No.</b>													
Axial lead wire	Radial lead wire	Reed Contact	Voltage	Indicator lamp	Lead wire								
			AC DC										
M0H*	M0V*	● ●	● ●	1-color display	2-wire								
M5H*	M5V*		● ●	Without indicator lamp									
M2H*	M2V*		● ●	1-color display									
-	M2WV*	● ●	● ●	2-color display	2-wire								
M3H*	M3V*		● ●	1-color display									
-	M3WV*		● ●	2-color display									
M3PH*	M3PV*	● ●	● ●	1-color display (custom)	3-wire								
T2WH*	T2WV*		● ●	2-color display									
T2YH*	T2YV*		● ●										
T3WH*	T3WV*	● ●	● ●	2-color display	3-wire								
T3YH*	T3YV*		● ●										
T2YD*	-		● ●	● ●		2-color display for AC magnetic field	2-wire						
T2YDT*	-	● ●	● ●										
<b>* Lead wire length</b>													
Blank	1 m (standard)												
3	3 m (option)												
5	5 m (option)												
<b>G Switch quantity</b>													
R	1 on R side												
L	1 on L side												
D	2												
T	3												
4	4 (when there are more than 4 switches, indicate switch quantity.)												
<b>H Option</b>													
		Bore size ( $\phi$ )		12	16	20	25	32	40	50	63	80	100
<b>A</b>	Both-sides full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●	●
<b>A1</b>	R side full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●	●
<b>A2</b>	L side full stroke, adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●	●
<b>A3</b>	Full stroke adjustable, adjusting bracket to be added		●	●	●	●							
<b>L*</b>	Intermediate support bracket (for 00, LB)		●	●	●	●	●	●	●	●	●	●	●
<b>N*</b>	Intermediate support bracket (for LB1)		●	●	●	●	●						
<b>H</b>	Larger thread for table installation		●	●	●								
<b>U</b>	Height adjustment plate		●	●	●	●	●	●	●	●	●	●	●
Blank	: F (Standard)		●	●	●	●	●	●	●	●	●	●	●
<b>R</b>	: R (Common port)		●	●	●	●	●	●	●	●	●	●	●
<b>B</b>	: F		●	●	●	●	●	●	●	●	●	●	●
<b>T</b>	: R (Common port)		●	●	●	●	●	●	●	●	●	●	●
<b>D</b>	: D					●	●	●	●	●	●	●	●
<b>S</b>	: D						●	●	●	●	●	●	●
<b>X</b>	: F (Common port)												●

### Option selection table

● : Available    □ : Not available

Option	Option															
	Code	A	A1	A2	A3	L*	N*	H	U	Blank	R	B	T	D	S	X
		Both side full stroke length adjustable, with shock absorber	R side full stroke length adjustable, with shock absorber	L side full stroke length adjustable, with shock absorber	Full stroke length adjustable with adjusting bracket to be added later	Intermediate support bracket (for 00, LB)	Intermediate support bracket (for LB1)	Larger thread for table installation	Height adjustment plate	Port position F, cushion needle position F (standard)	Port position R, cushion needle position F (common port)	Port position F, cushion needle position B	Port position R, cushion needle position B (common port)	Port position D, cushion needle position F	Port position D, cushion needle position D	Port position F, cushion needle position F (common port)
A	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
A1	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
A2	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
A3	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
L*	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
N*	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
H	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
U	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
Blank	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
R	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
B	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
T	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
D	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
S	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
X	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●

\*1: Some combinations are not available depending on the bore size. Be sure to check the **H** Option in "How to order" on the previous page.

\*2: LB1 with port position D is not possible. (φ25, φ32)

### Theoretical thrust table

(Unit: N)

Bore size (mm)	Operating direction	Working pressure MPa							
		0.1	0.15	0.2	0.3	0.4	0.5	0.6	0.7
φ12	Push/Pull	-	-	27.7	41.5	55.3	69.1	83.0	96.8
φ16	Push/Pull	-	-	43.2	64.8	86.4	1.08 × 10 <sup>2</sup>	1.30 × 10 <sup>2</sup>	1.51 × 10 <sup>2</sup>
φ20	Push/Pull	-	-	62.9	94.4	1.26 × 10 <sup>2</sup>	1.57 × 10 <sup>2</sup>	1.89 × 10 <sup>2</sup>	2.20 × 10 <sup>2</sup>
φ25	Push/Pull	54.2	81.4	1.08 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.17 × 10 <sup>2</sup>	2.71 × 10 <sup>2</sup>	3.25 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>
φ32	Push/Pull	81.4	1.22 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.44 × 10 <sup>2</sup>	3.26 × 10 <sup>2</sup>	4.07 × 10 <sup>2</sup>	4.88 × 10 <sup>2</sup>	5.70 × 10 <sup>2</sup>
φ40	Push/Pull	1.27 × 10 <sup>2</sup>	1.90 × 10 <sup>2</sup>	2.53 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>	5.06 × 10 <sup>2</sup>	6.33 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	8.86 × 10 <sup>2</sup>
φ50	Push/Pull	1.99 × 10 <sup>2</sup>	2.98 × 10 <sup>2</sup>	3.98 × 10 <sup>2</sup>	5.96 × 10 <sup>2</sup>	7.95 × 10 <sup>2</sup>	9.94 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.39 × 10 <sup>3</sup>
φ63	Push/Pull	3.14 × 10 <sup>2</sup>	4.70 × 10 <sup>2</sup>	6.27 × 10 <sup>2</sup>	9.41 × 10 <sup>2</sup>	1.25 × 10 <sup>3</sup>	1.57 × 10 <sup>3</sup>	1.88 × 10 <sup>3</sup>	2.20 × 10 <sup>3</sup>
φ80	Push/Pull	5.06 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	1.01 × 10 <sup>3</sup>	1.52 × 10 <sup>3</sup>	2.03 × 10 <sup>3</sup>	2.53 × 10 <sup>3</sup>	3.04 × 10 <sup>3</sup>	3.54 × 10 <sup>3</sup>
φ100	Push/Pull	7.91 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.58 × 10 <sup>3</sup>	2.37 × 10 <sup>3</sup>	3.16 × 10 <sup>3</sup>	3.95 × 10 <sup>3</sup>	4.74 × 10 <sup>3</sup>	5.53 × 10 <sup>3</sup>

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

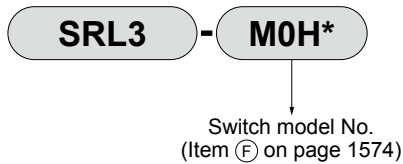
Spd  
Contr

Ending

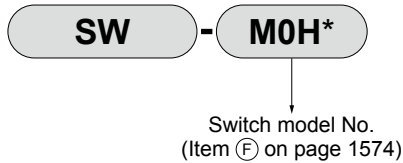
SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVPIN2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

## How to order switch (For configurations, refer to pages 1606 to 1608)

- Switch body + mounting bracket set (\*1)



- Switch body only



* Lead wire length	
Blank	1 m (standard)
3	3 m (option)
5	5 m (option)

\* indicates lead wire length.

- Mounting bracket set (\*2)

· M type switch



· T type switch



- Lead wire holder (\*3)

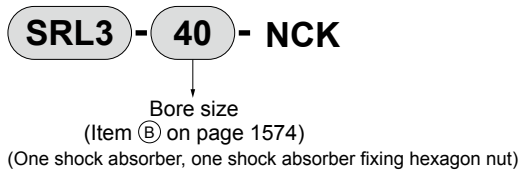


\*1: "Switch body + mounting bracket set" does not include lead wire holders. Order lead wire holders separately if necessary.

\*2: The mounting bracket is different between the M type switch and T type switch.

\*3: The quantity of lead wire holders per set is 10.

- How to order discrete shock absorber



(Note) The shock absorber fixing hexagon nut for SRL3-40 is a custom order product.

Applicable shock absorber model No.

Model	Shock absorber model No.
SRL3-12	NCK-00-0.3-C
SRL3-16	NCK-00-0.3-C
SRL3-20	NCK-00-0.7-C
SRL3-25	NCK-00-1.2
SRL3-32	NCK-00-2.6
SRL3-40	NCK-00-7
SRL3-50	NCK-00-12
SRL3-63	NCK-00-12
SRL3-80	NCK-00-20
SRL3-100	NCK-00-20

- How to order discrete intermediate support bracket

For 00/LB



↓

Bore size  
(Item ⑥ on page 1574)

For LB1



↓

Bore size  
(Item ⑥ on page 1574)

- How to order full stroke length adjusting bracket kit



↓

Bore size  
(Item ⑥ on page 1574)

(For configurations, refer to "Full stroke length adjusting bracket kit" on page 1607.)

- How to order repair parts



↓

Bore size (Item ⑥ on page 1574)      Stroke length (Item ⑤ on page 1574)

- How to order mounting bracket



↓

Mounting (Item ① on page 1574)      Bore size (Item ⑥ on page 1574)

(Bracket x2, mounting bolt x4)

- How to order height adjustment plate set

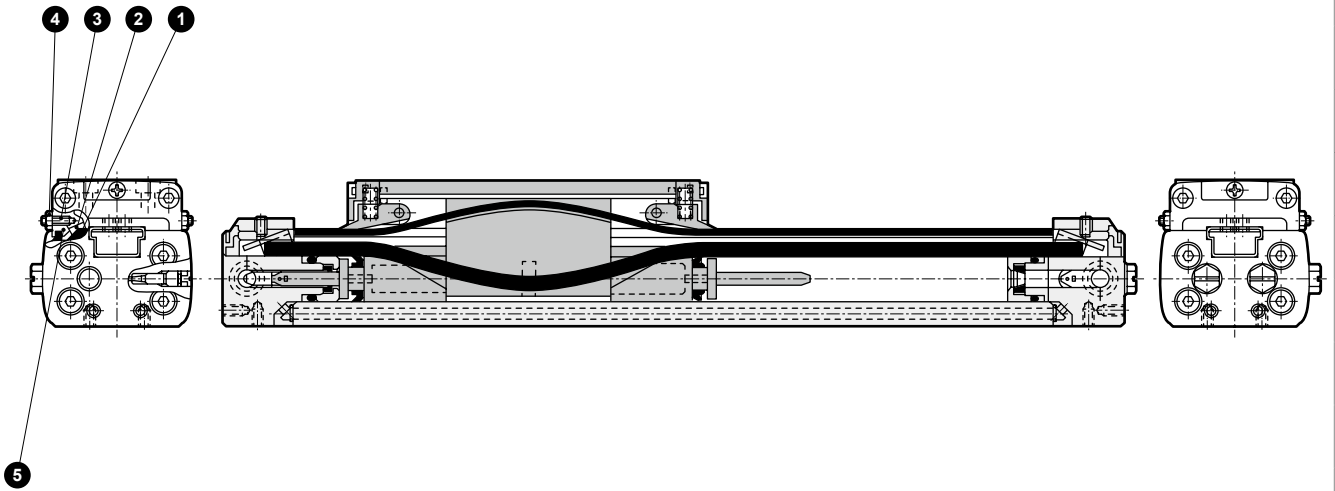


↓

Bore size  
(Item ⑥ on page 1574)

(Plate, mounting bolt x4)

### Internal structure and parts list (φ12 to φ40 equiv.)



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Slider	Polyacetal resin		4	Nut	Steel	Zinc chromate
2	Slider plate	Steel		5	Dust wiper	Polyacetal resin	
3	Adjusting screw	Alloy steel	Zinc chromate				

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ12 or equiv.	SRL3-G-12K-*	
φ16 or equiv.	SRL3-G-16K-*	
φ20 or equiv.	SRL3-G-20K-*	① ⑤ ⑧ ⑨
φ25 or equiv.	SRL3-G-25K-*	⑱ ⑳ ㉑ ㉒ ㉓ ㉔ ㉕
φ32 or equiv.	SRL3-G-32K-*	㉖
φ40 or equiv.	SRL3-G-40K-*	

\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.

\*2 : Part numbers ⑧ ⑨ ⑱ ⑳ ㉑ ㉒ ㉓ ㉔ ㉕ are the same as those on page 1561.

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/

COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/

MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

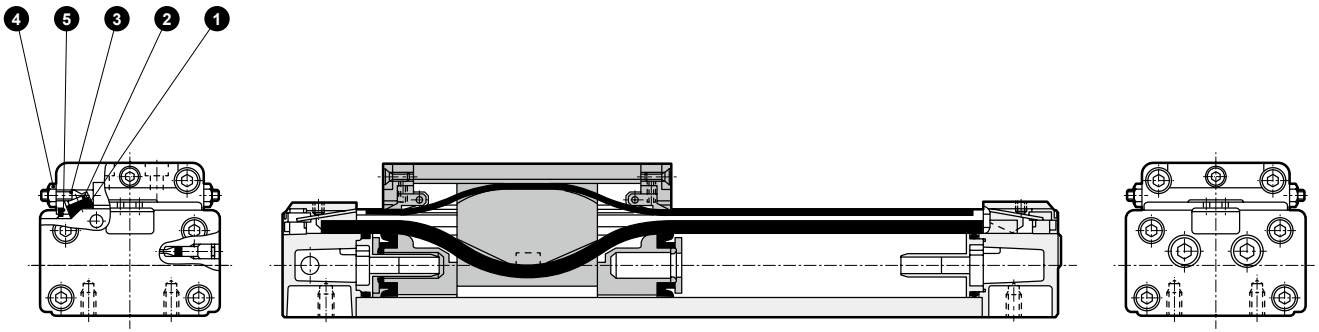
Spd

Contr

Ending

SCP\*3 Internal structure and parts list (φ50, φ63 equiv.)

- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/  
COVPIN2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/  
MSDG
- FC\*
- STK
- SRL3
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd  
Contr
- Ending



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Slider	Polyacetal resin		4	Nut	Steel	Zinc chromate
2	Slider plate	Steel	Zinc chromate	5	Dust wiper	Polyacetal resin	
3	Adjusting screw	Alloy steel	Zinc chromate				

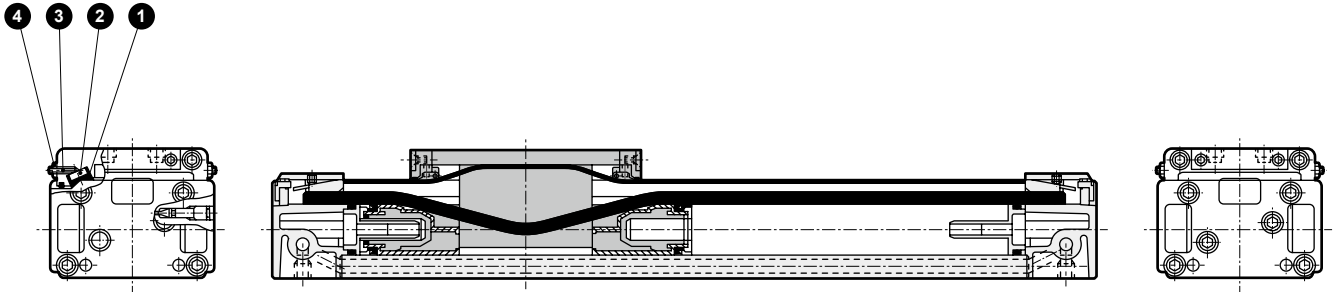
### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ50 or equiv.	SRL3-G-50K-*	① ⑤ ⑧ ⑨ ⑱
φ63 or equiv.	SRL3-G-63K-*	⑳ ㉑ ㉒ ㉓ ㉔

\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.  
 \*2 : Part numbers ⑧ ⑨ ⑱ ㉑ ㉒ ㉓ ㉔ are the same as those on page 1562.

### Internal structure and parts list (φ80, φ100 equiv.)

SCP*3
CMK2
CMA2
SCM
SCG
SCA2
SCS2
CKV2
CAV2/ COVP/N2
SSD2
SSG
SSD
CAT
MDC2
MVC
SMG
MSD/ MSDG
FC*
STK
<b>SRL3</b>
SRG3
SRM3
SRT3
MRL2
MRG2
SM-25
ShkAbs
FJ
FK
Spd Contr
Ending



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Slider	Polyacetal resin		3	Adjusting screw	Alloy steel	Zinc chromate
2	Slider plate	Steel	Zinc chromate	4	Nut	Steel	Zinc chromate

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ80 or equiv.	SRL3-G-80K-*	① ⑧ ⑨ ⑱ ⑳
		㉒ ㉔ ㉕ ㉖ ㉗
φ100 or equiv.	SRL3-G-100K-*	㉘ ㉙

\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.

\*2: Part numbers ⑧ ⑨ ⑱ ⑳ ㉒ ㉔ ㉕ ㉖ ㉗ ㉘ ㉙ are the same as those on page 1563.

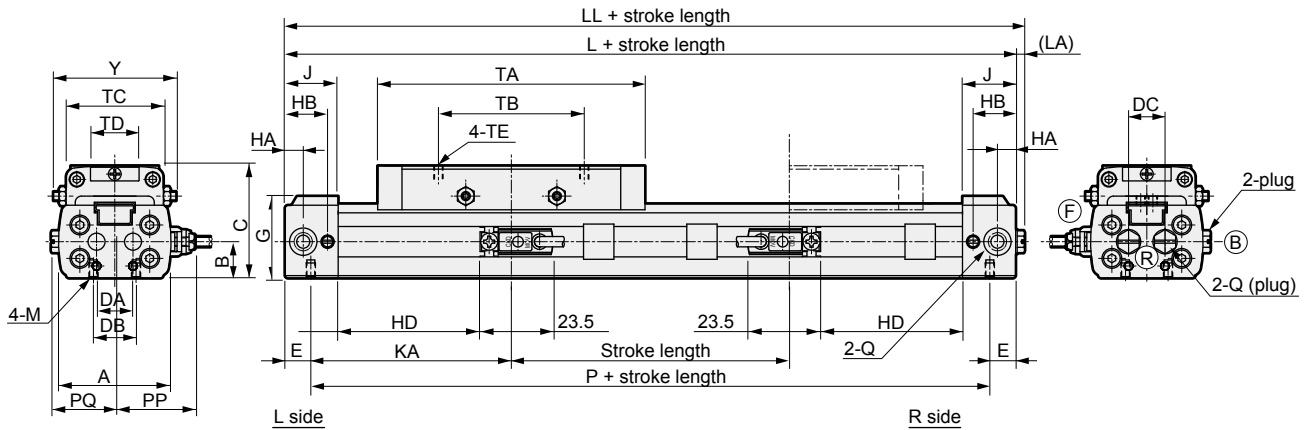


# SRL3-G Series

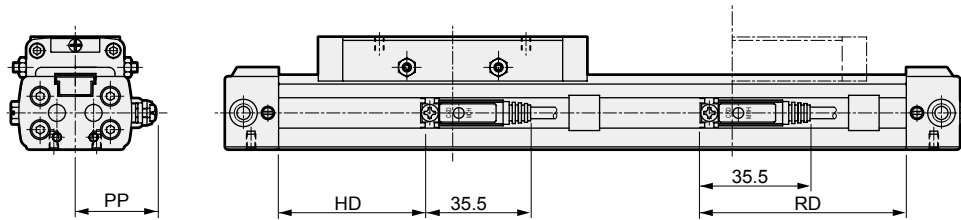


## Dimensions (φ12 to φ20 equiv.)

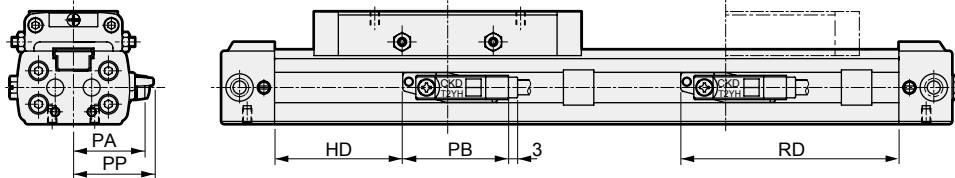
- With cylinder switch SRL3-G-\*\*-\*\*-\*\*-\*M\*V\* (lead wire L-shaped)



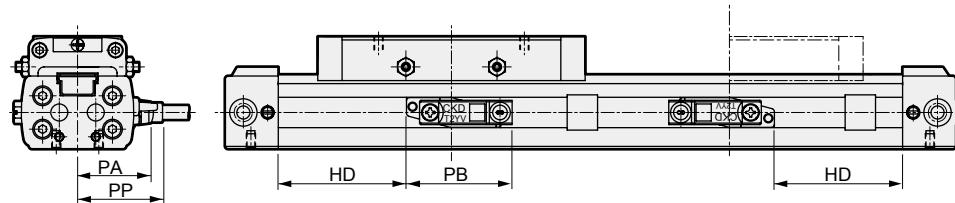
- With cylinder switch SRL3-G-\*\*-\*\*-\*\*-\*M\*H\* (lead wire straight)



- With cylinder switch SRL3-G-\*\*-\*\*-\*\*-\*T\*H\* (T\*W, T\*Y, T2YD)



- With cylinder switch SRL3-G-\*\*-\*\*-\*\*-\*T\*V\* (T\*W, T\*Y)



RD: Max. sensitivity installation position HD: Max. sensitivity installation position

Code	A	B	C	DA	DB	DC	E	G	HA	HB	J	KA	L	LL	LA	M	P	PQ	Q	TA	TB	TC	TD	TE	Y	
SM-25	Bore size (mm)																									
	φ12 or equiv.																									
	φ16 or equiv.																									
ShkAbs	φ20 or equiv.																									

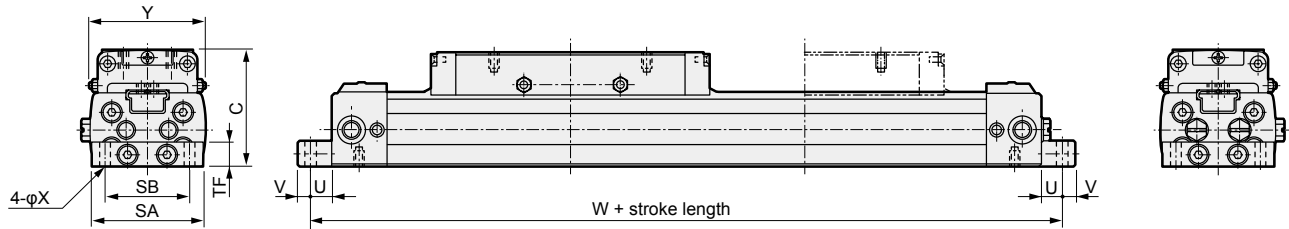
Code	With switch															
	HD			RD			PA	PB			PP					
	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV
Spd Contr	φ12 or equiv.															
	φ16 or equiv.															
	φ20 or equiv.															

\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

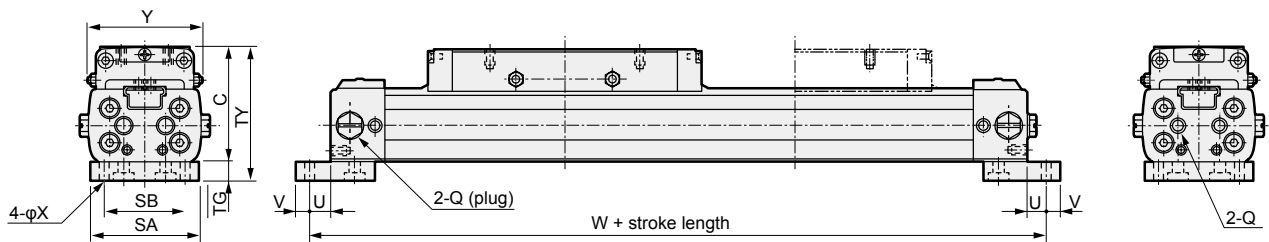
### Dimensions (φ12 to φ20 equiv.)



- With foot bracket SRL3-G-LB-12 to 20



- With foot bracket SRL3-G-LB1-12 to 20



Code	With foot bracket (LB)							With foot bracket (LB1)							
	SA	SB	TF	U	V	W	X	SA	SB	TG	TY	U	V	W	X
φ12 or equiv.	32	24	8	6	4	148	3.4	32	24	6	39	6	4	148	3.4
φ16 or equiv.	35	26	8	6	4	161	3.4	35	26	6	43	6	4	161	3.4
φ20 or equiv.	43	33	10	6	6	181	4.5	43	33	8	50	6	6	181	4.5

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd  
Contr

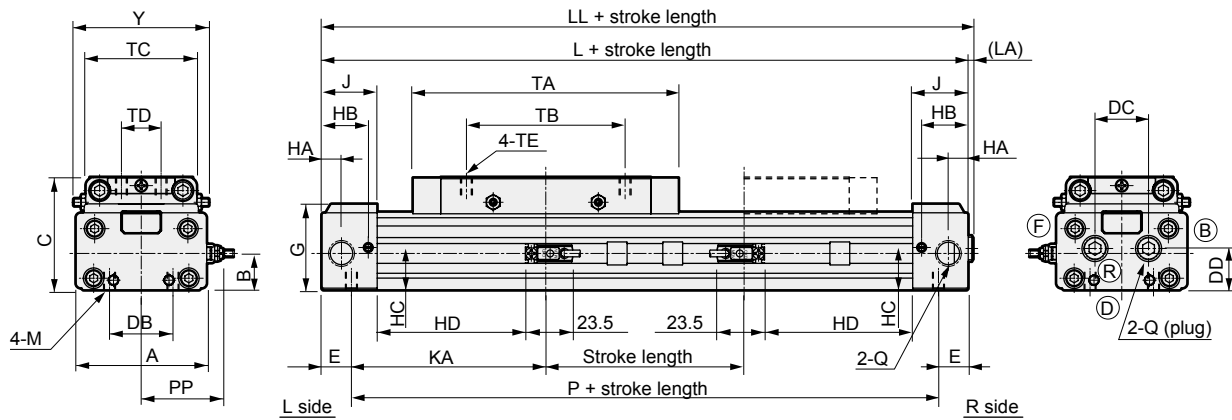
Ending

# SRL3-G Series

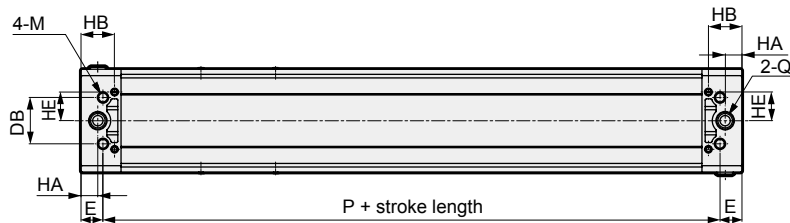


## Dimensions (φ25 to φ63 equiv.)

- With cylinder switch SRL3-G-\*\*-\*\*-\*-M\*V\* (lead wire L-shaped)



- Bottom piping (option code: D/S)



Code	A	B	C	DB	DC	DD	E	G	HA	HB	HC	HE	J	KA	L	LL	LA	M	P	Q	TA	TB	TC	TD	TE	Y
φ25 or equiv.	53	17	53	20	26	19	14	40.5	7.5	20	18.9	-	24	81	190	192	2	M6 depth 9	162	Rc1/8	122	70	48	20	M5 depth 6	58 to 61
φ32 or equiv.	66	18.5	57	32	27	21	15	43.5	10	23.5	21.5	17	28	98	226	228.5	2.5	M6 depth 9	196	Rc1/4	134	80	56	20	M6 depth 7.5	65 to 69
φ40 or equiv.	80	22	67	36	35	28	17	51.5	13	26	27	22.3	31	105	244	246.5	2.5	M8 depth 12	210	Rc1/4	148	90	68	30	M6 depth 9	77 to 81
φ50 or equiv.	96	28	82	45	35	35	23	61	15	33	35.3	11	39	106	258	260.5	2.5	M8 depth 12	212	Rc3/8	152	100	80	30	M8 depth 10.5	92 to 96
φ63 or equiv.	118	35	95	50	39	42	19	74	15	32	43	31	39	129	296	298.5	2.5	M10 depth 15	258	Rc3/8	168	110	102	40	M8 depth 11.5	114 to 118

Code	With switch																
	HD			RD			PA	PB			PP						
Bore size (mm)	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV	T*WH
φ25 or equiv.	60	56	52	82	86	90	34.3	35	34	33.5	34.5	34.5	36	33	38.4	30.7	27.2
φ32 or equiv.	74	70	66	96	100	104	41.3	35	34	33.5	41.5	41.5	43	40	45.4	37.7	34.2
φ40 or equiv.	80	76	72	102	106	110	48.3	35	34	33.5	48.5	48.5	50	47	52.4	44.7	41.2
φ50 or equiv.	79	75	71	101	105	109	56.3	35	34	33.5	56.5	56.5	58	55	60.4	52.7	49.2
φ63 or equiv.	98	94	90	120	124	128	67.3	35	34	33.5	67.5	67.5	69	66	71.4	63.7	60.2

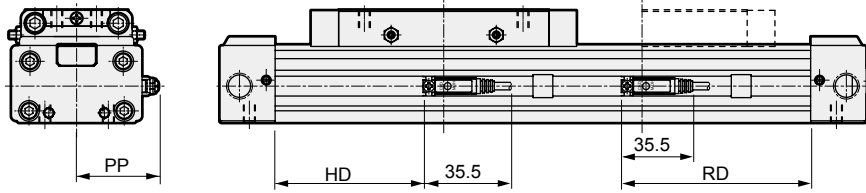
\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

\*2: Bottom piping is not available for φ25.

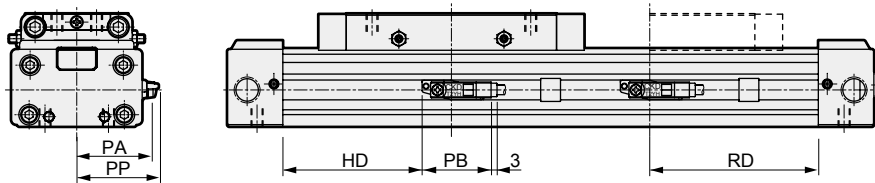
### Dimensions (φ25 to φ63 equiv.)



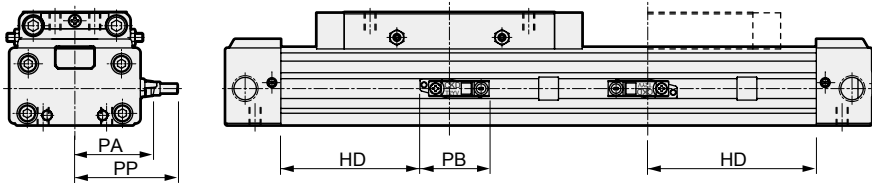
- With cylinder switch SRL3-G-\*\*-\*\*-\*\*\*-M\*H\* (lead wire straight)



- With cylinder switch SRL3-G-\*\*-\*\*-\*\*\*-T\*H (T\*W, T\*Y, T2YD)

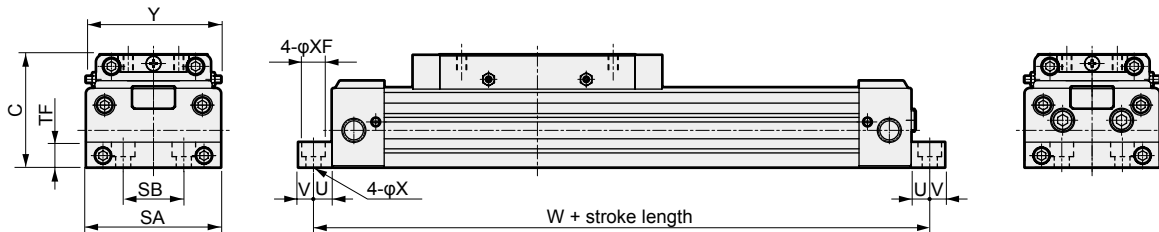


- With cylinder switch SRL3-G-\*\*-\*\*-\*\*\*-T\*V (T\*W, T\*Y)

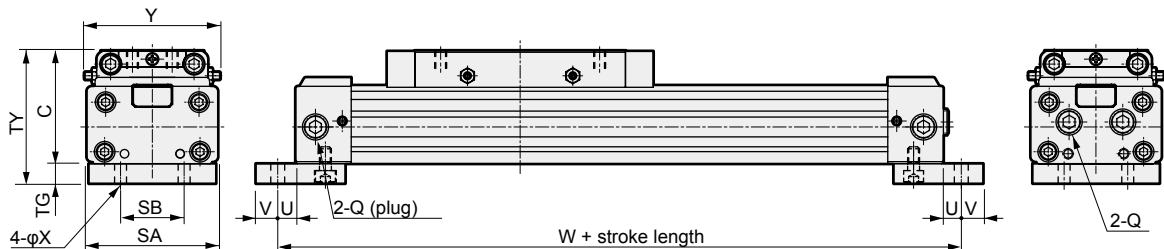


RD: Max. sensitivity installation position HD: Max. sensitivity installation position

- With foot bracket SRL3-G-LB-25 to 63



- With foot bracket SRL3-G-LB1-25, 32 (The mounting LB1 is not available for φ40 to φ63 or equiv.)



Code	With foot bracket (LB)								With foot bracket (LB1)							
	SA	SB	TF	U	V	W	X	XF	SA	SB	TG	TY	U	V	W	X
φ25 or equiv.	52	20	12	9	11	208	7	-	50	20	10	63	9	11	208	7
φ32 or equiv.	64	32	12	9	11	244	7	-	64	32	10	67	9	11	244	7
φ40 or equiv.	80	36	15	11	9	266	9	14 spot face depth 8.6	-	-	-	-	-	-	-	-
φ50 or equiv.	94	45	20	11	9	280	9	14 spot face depth 8.6	-	-	-	-	-	-	-	-
φ63 or equiv.	116	50	25	13	12	322	11	17.5 spot face depth 10.8	-	-	-	-	-	-	-	-

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd Contr

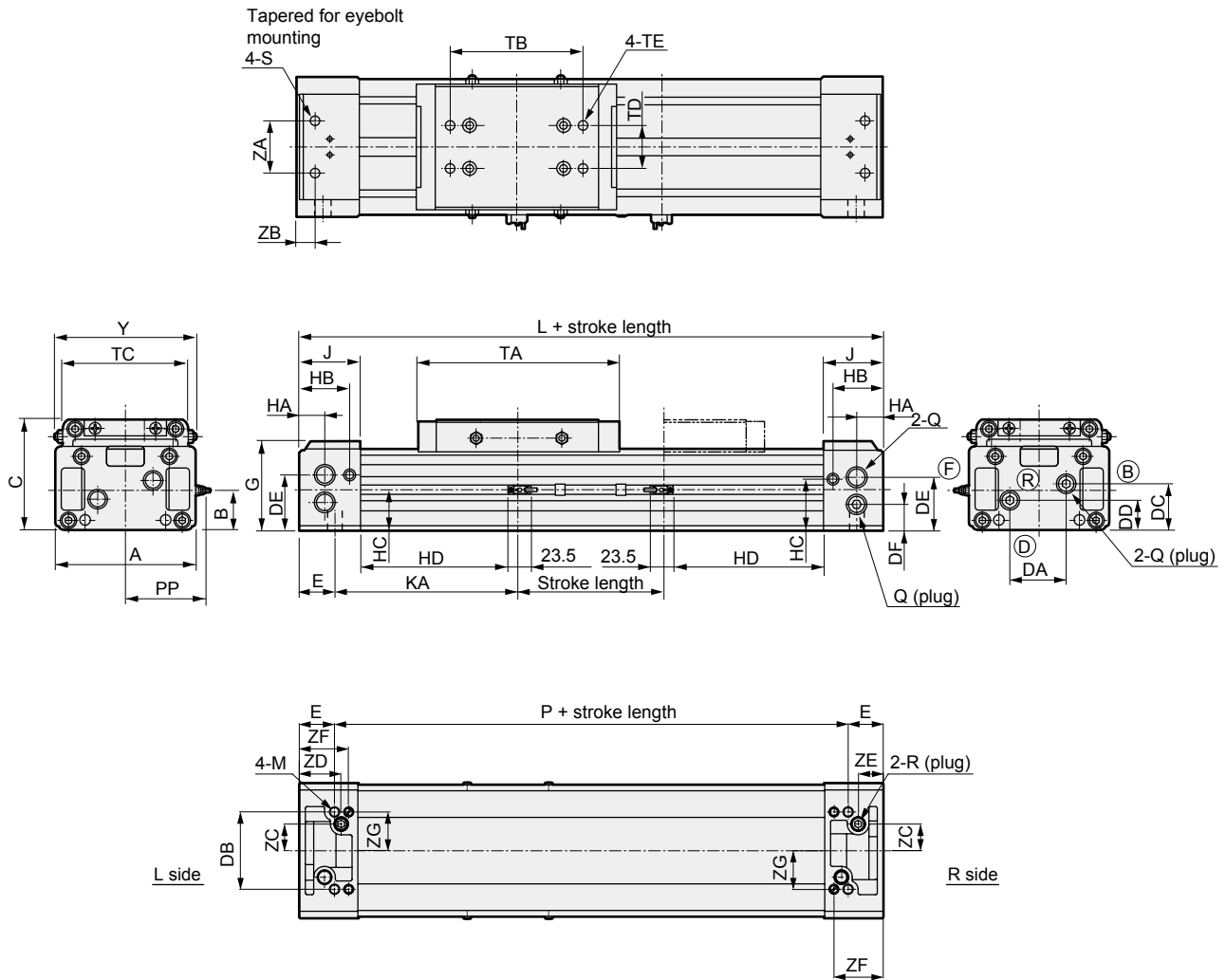
Ending

# SRL3-G Series



## Dimensions (φ80 to φ100 equiv.)

- With cylinder switch SRL3-G-\*\*-\*\*-\*\*\*-M\*V\*  
(lead wire L-shaped)



Code	A	B	C	DA	DB	DC	DD	DE	DF	E	G	HA	HB	HC	J	KA	L	M	P	Q	R	S
φ80 or equiv.	162	49	130	64	93	58	38	65	33	42	106	30	59	64.5	70	208	500	M12 depth 18	416	Rc1/2	Rc3/8	M12 depth 23
φ100 or equiv.	198	61.5	150	73	108	71.5	47.5	81.5	41.5	43	125	30	69	76.5	80	222	530	M12 depth 18	444	Rc1/2	Rc1/2	M12 depth 23

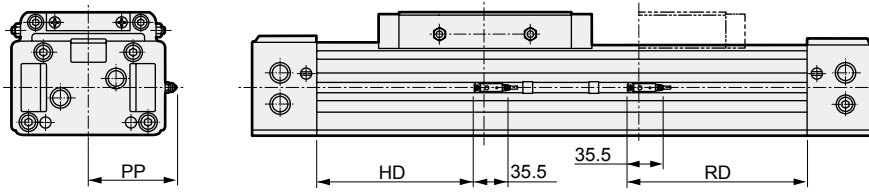
Code	TA	TB	TC	TD	TE	Y	ZA	ZB	ZC	ZD	ZE	ZF	ZG	With foot bracket						
Bore size (mm)	SA	SB	TF	U	V	W	X													
φ80 or equiv.	228	150	146	50	M12 depth 15	157 to 164	60	21	64	50	30	59	46.5	162	134	25	13	12	526	14
φ100 or equiv.	238	160	170	60	M12 depth 15	183 to 190	60	21	73	55	30	69	54	198	160	30	15	15	560	14

\*1: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

## Dimensions (φ80 to φ100 equiv.)

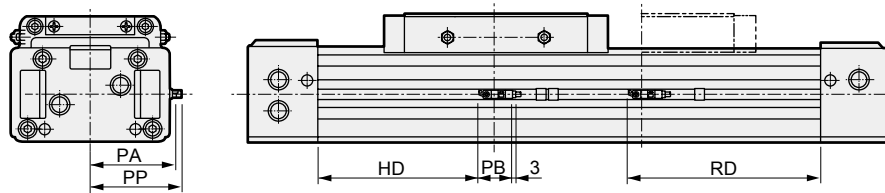


- With cylinder switch SRL3-G-\*\*-\*\*\*-M\*H\*  
(Axial lead wire)

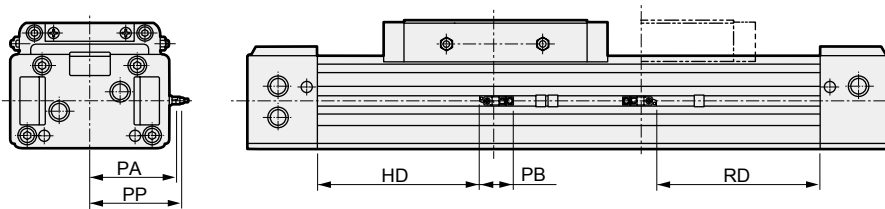


RD: Max. sensitivity mounting position  
HD: Max. sensitivity mounting position

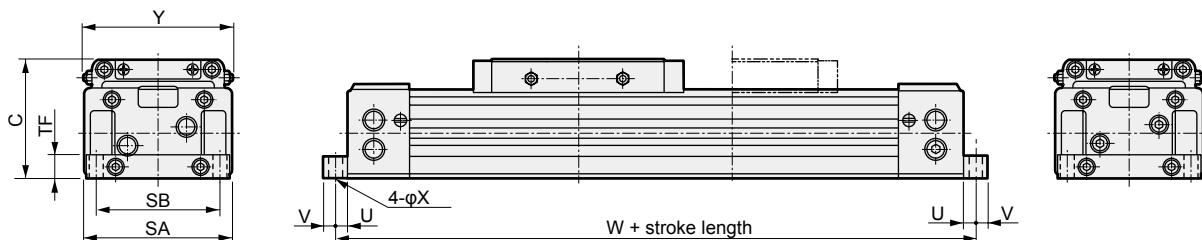
- With cylinder switch SRL3-G-\*\*-\*\*\*-T\*H (T\*W, T\*Y, T2YD)



- With cylinder switch SRL3-G-\*\*-\*\*\*-T\*V (T\*T\*W, T\*Y)

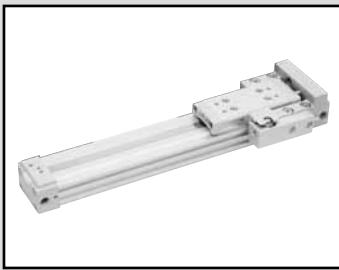


- With foot bracket SRL3-G-LB-\*\*-\*\*\*



Code	With switch																
	HD			RD			PA	PB			PP						
Bore size (mm)	M*	T*Y*	T*W	M*	T*Y*	T*W		T*Y*	T2YD	T*W*	M*V	M*H	T*YV	T*YH	T2YD	T*WV	T*WH
φ80 or equiv.	170	165	161	190	195	199	87.3	35	34	33.5	87.5	87.5	89	86	91.4	83.7	80.2
φ100 or equiv.	175	170	166	195	200	204	105.3	35	34	33.5	105.5	105.5	107	104	109.4	101.7	98.2

- SCP\*3
- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/COVP/N2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/MSDG
- FC\*
- STK
- SRL3**
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd Contr
- Ending



Rodless cylinder double acting/position locking

# SRL3-Q Series

- Bore size:  $\phi 12$ ,  $\phi 16$ ,  $\phi 20$ ,  $\phi 25$ ,  $\phi 32$ ,  $\phi 40$ ,  $\phi 50$ ,  $\phi 63$ ,  $\phi 80$ ,  $\phi 100$



## Specifications

Descriptions		SRL3-Q									
Bore size	mm	$\phi 12$	$\phi 16$	$\phi 20$	$\phi 25$	$\phi 32$	$\phi 40$	$\phi 50$	$\phi 63$	$\phi 80$	$\phi 100$
Actuation		Double acting									
Working fluid		Compressed air									
Max. working pressure	MPa	0.7 ( $\approx 100$ psi, 7 bar)									
Min. working pressure	MPa	0.2 ( $\approx 29$ psi, 2 bar)			0.15 ( $\approx 22$ psi, 1.5 bar)			0.1 ( $\approx 15$ psi, 1 bar)			
Proof pressure	MPa	1.05 ( $\approx 150$ psi, 10.5 bar)									
Ambient temperature	$^{\circ}\text{C}$	5 (41 $^{\circ}\text{F}$ ) to 60 (140 $^{\circ}\text{F}$ )									
Port size	Cylinder	M5		Rc1/8		Rc1/4		Rc3/8		Rc1/2	
	Position locking part	M5 Rc1/8									
Stroke tolerance	mm	$^{+2.0}_0$ (to 1000)			$^{+2.5}_0$ (to 3000)			$^{+3.0}_0$ (to 5000)			
Working piston speed	mm/s	50 to 2000 (standard piping) (*1)									
Cushion		Air cushion									
Lubrication		Not required (use turbine oil class 1 ISO VG32 if necessary for lubrication. Once lubricated, the cylinder will need periodic lubrication.)									
Position locking mechanism		Attached to R side of cover									
Holding force	N	Max. thrust x 0.7									

- \*1: (1) When the piston moves at 500 to 2000 mm/s, reduce the speed when entering the position locking mechanism to 500 mm/s or less. For common port piping, the working piston speed varies depending on the stroke length. Contact CKD.  
 (2) To reduce the speed, add an external shock absorber or deceleration circuit.  
 (3) Apply grease regularly to the sliding part of the lock lever.

## Allowable absorbed energy

Bore size (mm)	Cushioned		Without cushion	With shock absorber (initial set point)	
	Max absorbed energy (J)	Cushion stroke (mm)	Max absorbed energy (J)	Absorbed energy (J)	Effective stroke (mm)
$\phi 12$ or equiv.	0.03	14.5	0.003	2.4	5.5
$\phi 16$ or equiv.	0.22	19.2	0.007	2.4	5.5
$\phi 20$ or equiv.	0.59	22.2	0.010	5.7	7
$\phi 25$ or equiv.	1.40	20.9	0.015	10	9
$\phi 32$ or equiv.	2.57	23.5	0.030	18	13
$\phi 40$ or equiv.	4.27	23.9	0.050	50	16.5
$\phi 50$ or equiv.	9.13	24.9	0.072	86	21
$\phi 63$ or equiv.	17.4	29.6	0.138	86	21
$\phi 80$ or equiv.	40	45.8	0.393	143	25
$\phi 100$ or equiv.	67	45.8	0.622	143	25

## Stroke length

Bore size (mm)	Standard stroke length (mm)	Max. stroke length (mm)	Min. stroke length (mm)
$\phi 12$ equiv.	200/300 400/500 600/700 800/900 1000	5000	5
$\phi 16$ equiv.			
$\phi 20$ equiv.			
$\phi 25$ equiv.			
$\phi 32$ equiv.			
$\phi 40$ equiv.			
$\phi 50$ equiv.			
$\phi 63$ equiv.			
$\phi 80$ equiv.			
$\phi 100$ equiv.			

## Number of installed M type switches and min. stroke length (mm) \* The custom stroke length is available in 1 mm increments.

Switch quantity	1		2		3		4		5		6	
	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 16$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 20$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 25$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 32$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 40$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 50$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 63$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 80$ or equiv.	25		50		100		150		200		250	
$\phi 100$ or equiv.	25		50		100		150		200		250	

## Number of installed T type switches and min. stroke length (mm)

Switch quantity	1		2		3		4		5		6	
	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 16$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 20$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 25$ or equiv.	10	10	45	70	85	120	125	170	165	220	205	270
$\phi 32$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 40$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 50$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 63$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 80$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250
$\phi 100$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250



Be sure to read the Safety Precautions for **Position locking** on pages 1621 to 1626 before use.

## Switch specifications (M type switch)

- 1-color/2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire		
	M2V,M2H	M2WV (2-color display)	M3H/M3V	M3PH/M3PV (custom order)	M3WV
Applications	Dedicated for programmable controller		For programmable controller, relay, IC circuit, compact solenoid valve		
Output method	-		NPN output	PNP output	NPN output
Power supply voltage	-		4.5 to 28 VDC		10 to 28 VDC
Load voltage	10 to 30 VDC		30 VDC or less		
Load current	5 to 30 mA		100 mA or less	100 mA or less	100 mA or less
Indicator lamp	LED (Lit when ON)	Red/green LED (Lit when ON)	LED (Lit when ON)	Yellow LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 µA or less	0.05 mA or less	10 µA or less
Weight	g 1 m:22 3 m:57 5 m:93				

Descriptions	MOV,M0H		M5V,M5H	
	Applications	For programmable controller, relay		For programmable controller, relay, IC circuit (without indicator lamp), serial connection
Power supply voltage	-		-	
Load voltage	12/24 VDC	110 VAC	5/12/24 VDC	110 VAC or less
Load current	5 to 50 mA	7 to 20 mA	50 mA or less	20 mA or less
Indicator lamp	LED (Lit when ON)		Without indicator lamp	
Leakage current	0 mA			
Weight	g 1 m:22 3 m:57 5 m:93			

\*1 : M0\* switch can be used for 24 VAC and 48 VAC within load current range of 7 to 20 mA.

\*2: Refer to Ending Page 1 for other switch specifications.

## Switch specifications (T type switch)

- 2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire	
	T2YH/T2YV	T2WH/T2WV	T3YH/T3YV	T3WH/T3WV
Applications	Dedicated for programmable controller		For programmable controller, relay	
Output method	-		NPN output	NPN output
Power supply voltage	-		10 to 28 VDC	
Load voltage	10 to 30 VDC	24 VDC ±10%	30 VDC or less	
Load current	5 to 20 mA		50 mA or less	
Indicator lamp	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 µA or less	
Weight	g 1 m:33 3 m:87 5 m:142		1 m:18 3 m:49 5 m:80	

- For AC magnetic field

Descriptions	Proximity 2-wire	
	T2YD,T2YDT	
Applications	Dedicated for programmable controller	
Indicator lamp	Red/green LED (Lit when ON)	
Load voltage	24 VDC ±10%	
Load current	5 to 20 mA	
Internal voltage drop	6V or less	
Leakage current	1.0 mA or less	
Weight	g 1 m:61 3 m:166 5 m:272	

Note: This switch cannot be used in DC magnetic field.

## Cylinder weight

Unit: kg

Bore size (mm)	Weight for 0 mm stroke length			Switch weight	Mounting bracket weight		Additional weight per St = 100mm
	Basic (00)	Foot			T type	M type	
		(LB)	(LB1)				
φ12 or equiv.	0.38	0.39	0.40	Refer to the weight in the switch specifications.	0.005	0.001	0.10
φ16 or equiv.	0.47	0.48	0.50				0.13
φ20 or equiv.	0.74	0.76	0.80				0.18
φ25 or equiv.	1.5	1.6	1.6				0.28
φ32 or equiv.	2.4	2.5	2.6				0.36
φ40 or equiv.	3.6	3.7	-				0.53
φ50 or equiv.	6.0	6.1	-				0.75
φ63 or equiv.	8.8	9.1	-				1.11
φ80 or equiv.	22.4	23.0	-				2.32
φ100 or equiv.	30.5	31.5	-				3.38

SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVP/N2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending



# SRL3-Q Series

## How to order

Without switch (built-in magnet for switch)

**SRL3-Q-00-12-B-200-B**

With switch (built-in magnet for switch)

**SRL3-Q-00-12-B-200-M0H-R-B**

**A** Mounting  
\*1, \*2

**B** Bore size

**C** Port thread

**D** Cushion

**E** Stroke length

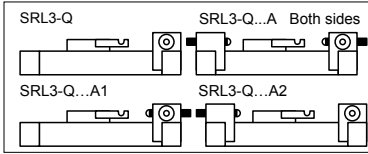
**F** Switch model No.  
\*4

**G** Switch quantity

**H** Option  
\*5, \*6  
\*7, \*8  
\*9, \*10

### ⚠ Precautions for model No. selection

- \*1 : Mounting bracket will be shipped assembled with the product.
- \*2 : For 12, 16, 20, 25 and 32 bore sizes with option code "R" or "T", the mounting will be "00" or "LB1". (Piping with "LB" is not possible for option codes "R" and "T".)
- \*3 : Refer to page 1586 for the min. stroke length with switch.
- \*4 : Switches other than (F) Switch model No. are also available. (Custom order) Refer to Ending Page 1 for details.
- \*5 : The full stroke length adjusting bracket on R side is provided as standard for the position locking. Therefore, if "A1" is selected, a shock absorber only is added to R side. In the case of "A", R side is position locking and full stroke length adjustable with shock absorber, and L side is full stroke length adjustable with shock absorber. (Figure below)



- \*6 : "\*" of L\* and N\* indicates the number of sets. When more than one set are necessary, specify "L2" (for LB) or "N2" (for LB1).  
2 pcs./set
- \*7 : For the port and cushion needle position codes, refer to dimensions on pages 1564 to 1568.
- \*8 : In the case of the standard with φ12 to φ25, remove the cover, attach a flat nut and install the full stroke length adjusting bracket. A flat nut is attached to option "A3" to enable retrofitting the full stroke length adjusting bracket without removing the cover.
- \*9 : In "H", the thread size for φ12 and φ16 will be "M4" and that for φ20 will be "M5".
- \*10 : Check the option combinations in "Option selection table" on the next page.
- \*11 : Copper and PTFE free as standard. (except for type with shock absorber)

### [Example of model No.]

**SRL3-Q-00-12B-200-M0H-R-B**

Model: Rodless cylinder position locking

- A** Mounting : Basic
- B** Bore size : φ12 mm
- C** Port thread : Rc thread
- D** Cushion : Both sides cushioned
- E** Stroke length : 200 mm
- F** Switch model No. : Reed M0H switch, lead wire 1 m
- G** Switch quantity : 1 on R side
- H** Option : Port position F, cushion needle position B

Code	Content											
<b>A Mounting</b>												
00	Basic											
LB	Axial foot											
LB1	Axial foot (φ12 to φ32 only)											
<b>B Bore size (mm)</b>												
12	φ12											
16	φ16											
20	φ20											
25	φ25											
32	φ32											
40	φ40											
50	φ50											
63	φ63											
80	φ80											
100	φ100											
<b>C Port thread</b>												
Blank	Rc thread											
N	NPT thread (φ20 or more) (custom order product)											
G	G thread (φ20 or more) (custom order product)											
<b>D Cushion</b>												
B	Both sides cushioned											
R	R side cushioned											
L	L side cushioned											
N	Without cushion											
<b>E Stroke length (mm)</b>												
Bore size	Stroke length *3	Custom stroke length										
φ12 to φ100	5 to 5000	In 1 mm increments										
<b>F Switch model No.</b>												
Axial lead wire	Radial lead wire	Contact	Voltage	Indicator lamp	Lead wire							
			AC DC									
M0H*	M0V*	Reed	● ●	1-color display	2-wire							
M5H*	M5V*		● ●	Without indicator lamp								
M2H*	M2V*		● ●	1-color display								
-	M2WV*		● ●	2-color display								
M3H*	M3V*	Proximity	● ●	1-color display	2-wire							
-	M3WV*		● ●	2-color display								
M3PH*	M3PV*		● ●	1-color display (custom)	3-wire							
T2WH*	T2WV*		● ●	2-color display	2-wire							
T2YH*	T2YV*		● ●									
T3WH*	T3WV*		● ●	2-color display	3-wire							
T3YH*	T3YV*	● ●										
T2YD*	-	● ●	2-color display for AC magnetic field	2-wire								
T2YDT*	-	● ●										
<b>* Lead wire length</b>												
Blank	1 m (standard)											
3	3 m (option)											
5	5 m (option)											
<b>G Switch quantity</b>												
R	1 on R side											
L	1 on L side											
D	2											
T	3											
4	4 (when there are more than 4 switches, indicate switch quantity.)											
<b>H Option</b>												
	Bore size (φ)		12	16	20	25	32	40	50	63	80	100
A	Both-sides full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A1	R side full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A2	L side full stroke, adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A3	Full stroke adjustable, adjusting bracket to be added		●	●	●	●	●	●	●	●	●	●
Y	Floating fitting		●	●	●	●	●	●	●	●	●	●
Y1	Thin floating fitting		●	●	●	●	●	●	●	●	●	●
L*	Intermediate support bracket (for 00, LB)		●	●	●	●	●	●	●	●	●	●
N*	Intermediate support bracket (for LB1)		●	●	●	●	●	●	●	●	●	●
H	Larger thread for table installation		●	●	●	●	●	●	●	●	●	●
U	Height adjustment plate		●	●	●	●	●	●	●	●	●	●
Blank	:F (Standard)		●	●	●	●	●	●	●	●	●	●
R	:R (Common port)		●	●	●	●	●	●	●	●	●	●
B	:B		●	●	●	●	●	●	●	●	●	●
T	:T (Common port)		●	●	●	●	●	●	●	●	●	●
D	:D		●	●	●	●	●	●	●	●	●	●
S	:S		●	●	●	●	●	●	●	●	●	●
X	:X (Common port)		●	●	●	●	●	●	●	●	●	●

### Option selection table

● : Available    □ : Not available

		Option																	
		Both side full stroke length adjustable, with shock absorber	R side full stroke length adjustable, with shock absorber	L side full stroke length adjustable, with shock absorber	Full stroke length adjustable with adjusting bracket to be added later	Floating fitting	Thin floating fitting	Intermediate support bracket (for 00, LB)	Intermediate support bracket (for LB1)	Larger thread for table installation	Height adjustment plate	Port position F, cushion needle position F (standard)	Port position R, cushion needle position F (common port)	Port position F, cushion needle position B	Port position R, cushion needle position B (common port)	Port position D, cushion needle position F	Port position D, cushion needle position D	Port position F, cushion needle position F (common port)	
		Code	A	A1	A2	A3	Y	Y1	L*	N*	H	U	Blank	R	B	T	D	S	X
Option	A						●	●	●	●	●	●	●	●	●	●	●	●	●
	A1						●	●	●	●	●	●	●	●	●	●	●	●	●
	A2						●	●	●	●	●	●	●	●	●	●	●	●	●
	A3						●	●	●	●	●	●	●	●	●	●	●	●	●
	Y							●	●					●	●	●	●	●	●
	Y1								●	●				●	●	●	●	●	●
	L*										●	●		●	●	●	●	●	●
	N*										●	●		●	●	●	●	●	●
	H												●	●	●	●	●	●	●
	U												●	●	●	●	●	●	●
	Blank																		
	R																		
	B																		
	T																		
	D																		
	S																		
X																			

### Specifications for rechargeable battery

(Catalog No. CC-1226A)

- Design compatible with rechargeable battery manufacturing process

**SRL3 - Q - ..... - P4\***

\*1: Some combinations are not available depending on the bore size. Be sure to check the **H** Option in "How to order" on the previous page.

\*2: LB1 with port position D is not possible. (φ25, φ32)

### Theoretical thrust table

(Unit: N)

Bore size (mm)	Operating direction	Working pressure MPa							
		0.1	0.15	0.2	0.3	0.4	0.5	0.6	0.7
φ12	Push/Pull	-	-	27.7	41.5	55.3	69.1	83.0	96.8
φ16	Push/Pull	-	-	43.2	64.8	86.4	1.08 × 10 <sup>2</sup>	1.30 × 10 <sup>2</sup>	1.51 × 10 <sup>2</sup>
φ20	Push/Pull	-	-	62.9	94.4	1.26 × 10 <sup>2</sup>	1.57 × 10 <sup>2</sup>	1.89 × 10 <sup>2</sup>	2.20 × 10 <sup>2</sup>
φ25	Push/Pull	54.2	81.4	1.08 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.17 × 10 <sup>2</sup>	2.71 × 10 <sup>2</sup>	3.25 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>
φ32	Push/Pull	81.4	1.22 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.44 × 10 <sup>2</sup>	3.26 × 10 <sup>2</sup>	4.07 × 10 <sup>2</sup>	4.88 × 10 <sup>2</sup>	5.70 × 10 <sup>2</sup>
φ40	Push/Pull	1.27 × 10 <sup>2</sup>	1.90 × 10 <sup>2</sup>	2.53 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>	5.06 × 10 <sup>2</sup>	6.33 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	8.86 × 10 <sup>2</sup>
φ50	Push/Pull	1.99 × 10 <sup>2</sup>	2.98 × 10 <sup>2</sup>	3.98 × 10 <sup>2</sup>	5.96 × 10 <sup>2</sup>	7.95 × 10 <sup>2</sup>	9.94 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.39 × 10 <sup>3</sup>
φ63	Push/Pull	3.14 × 10 <sup>2</sup>	4.70 × 10 <sup>2</sup>	6.27 × 10 <sup>2</sup>	9.41 × 10 <sup>2</sup>	1.25 × 10 <sup>3</sup>	1.57 × 10 <sup>3</sup>	1.88 × 10 <sup>3</sup>	2.20 × 10 <sup>3</sup>
φ80	Push/Pull	5.06 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	1.01 × 10 <sup>3</sup>	1.52 × 10 <sup>3</sup>	2.03 × 10 <sup>3</sup>	2.53 × 10 <sup>3</sup>	3.04 × 10 <sup>3</sup>	3.54 × 10 <sup>3</sup>
φ100	Push/Pull	7.91 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.58 × 10 <sup>3</sup>	2.37 × 10 <sup>3</sup>	3.16 × 10 <sup>3</sup>	3.95 × 10 <sup>3</sup>	4.74 × 10 <sup>3</sup>	5.53 × 10 <sup>3</sup>

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/IN2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

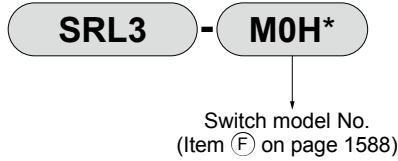
Spd  
Contr

Ending

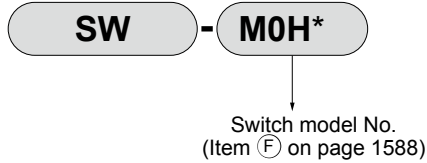
SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVPIN2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

## How to order switch (For configurations, refer to pages 1606 to 1608)

- Switch body + mounting bracket set (\*1)



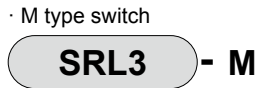
- Switch body only



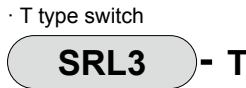
* Lead wire length	
Blank	1 m (standard)
3	3 m (option)
5	5 m (option)

\* indicates lead wire length.

- Mounting bracket set (\*2)



· M type switch



· T type switch

- Lead wire holder (\*3)

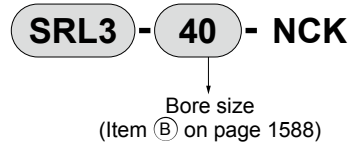


\*1: "Switch body + mounting bracket set" does not include lead wire holders. Order lead wire holders separately if necessary.

\*2: The mounting bracket is different between the M type switch and T type switch.

\*3: The quantity of lead wire holders per set is 10.

- How to order discrete shock absorber



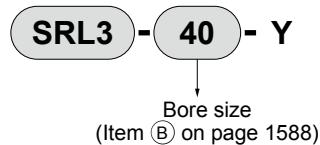
(One shock absorber, one shock absorber fixing hexagon nut)

(Note) The shock absorber fixing hexagon nut for SRL3-40 is a custom order product.

Applicable shock absorber model No.

Model	Shock absorber model No.
SRL3-12	NCK-00-0.3-C
SRL3-16	NCK-00-0.3-C
SRL3-20	NCK-00-0.7-C
SRL3-25	NCK-00-1.2
SRL3-32	NCK-00-2.6
SRL3-40	NCK-00-7
SRL3-50	NCK-00-12
SRL3-63	NCK-00-12
SRL3-80	NCK-00-20
SRL3-100	NCK-00-20

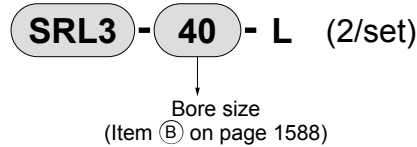
- How to order floating fitting set



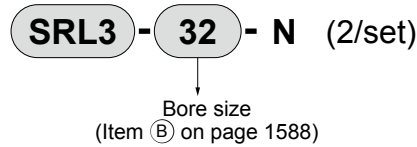
(Mount, mount base, pin, plain washer, pan head machine screw with spring washer)

- How to order discrete intermediate support bracket

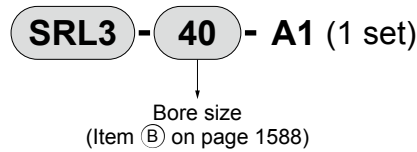
For 00/LB



For LB1

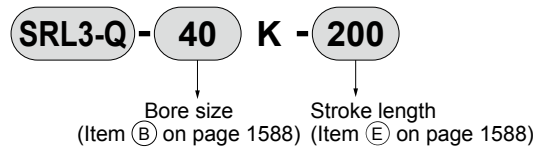


- How to order full stroke length adjusting bracket kit

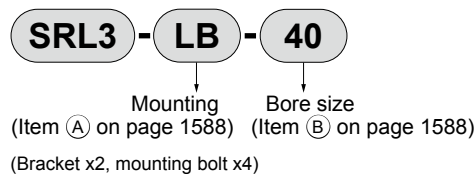


(For configurations, refer to "Full stroke length adjusting bracket kit" on page 1607.)

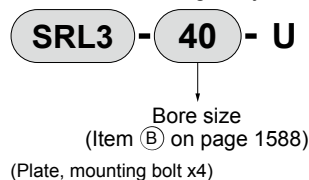
- How to order repair parts



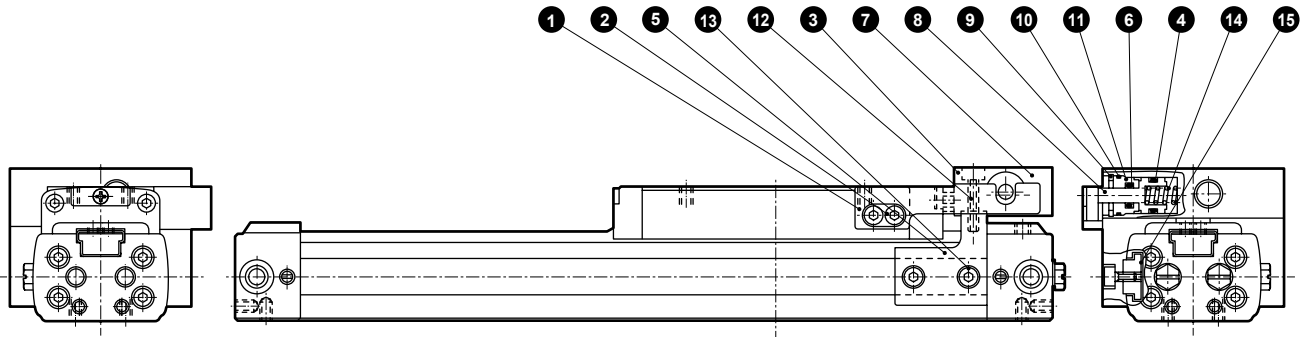
- How to order mounting bracket



- How to order height adjustment plate set



### Internal structure and parts list (φ12 to φ25 equiv.)



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Lock lever	Alloy steel	Chrome plating	9	C type snap ring for hole	Steel	
2	Hexagon socket head cap screw	Alloy steel	Zinc chromate	10	Gasket	Nitrile rubber	
3	Stopper	Steel	Black finish	11	Rod cover	Aluminum alloy	Alumite
4	Piston packing	Nitrile rubber		12	Hexagon socket head cap screw	Alloy steel	Zinc chromate
5	Adaptor	Steel	Zinc chromate	13	Hexagon socket head cap screw	Alloy steel	Zinc chromate
6	Rod packing	Nitrile rubber		14	Spring	Steel	Electrodeposition
7	Position locking mechanism	Aluminum alloy	Alumite	15	Flat nut	Alloy steel	Black finish
8	Lock pin (stopper piston)	Alloy steel	Chrome plating				

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ12 or equiv.	SRL3-Q-12K-*	
φ16 or equiv.	SRL3-Q-16K-*	④ ⑥ ⑩ ⑧ ⑨ ⑱
φ20 or equiv.	SRL3-Q-20K-*	⑳ ㉑ ㉒ ㉓ ㉔
φ25 or equiv.	SRL3-Q-25K-*	

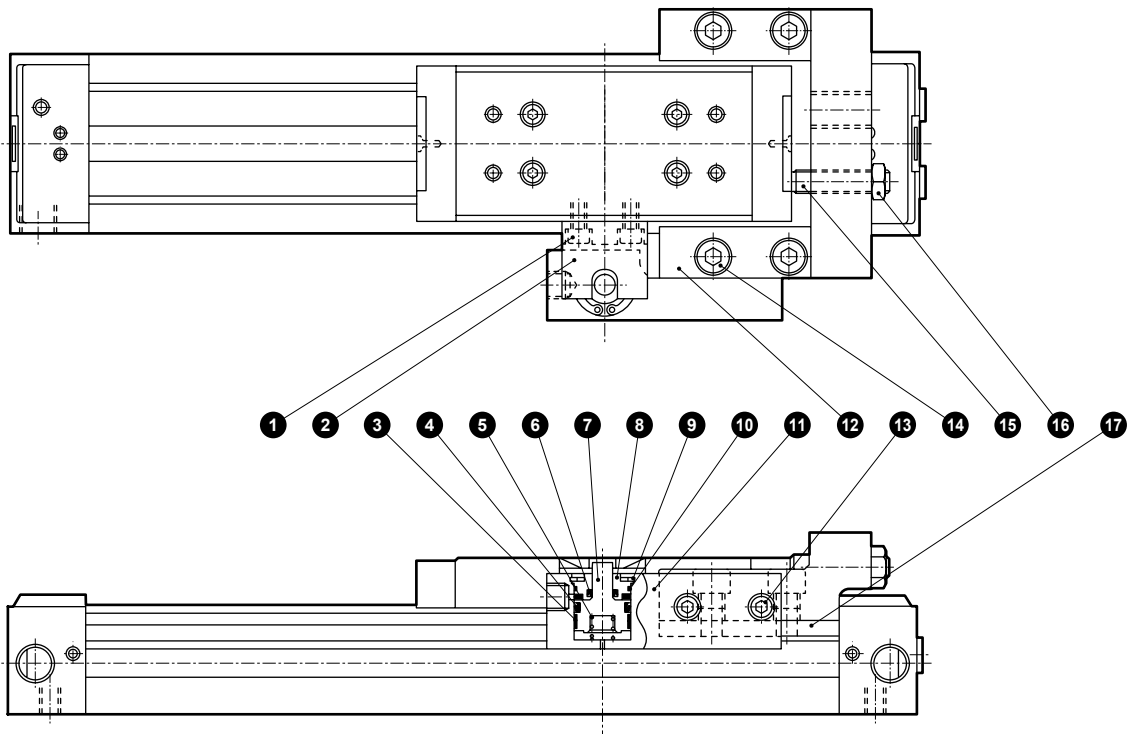
\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.

\*2: Part numbers ⑧⑨⑱⑳㉑㉒㉓㉔ are the same as those on page 1561.

- SCP\*3
- CMK2
- CMA2
- SCM
- SCG
- SCA2
- SCS2
- CKV2
- CAV2/COVP/IN2
- SSD2
- SSG
- SSD
- CAT
- MDC2
- MVC
- SMG
- MSD/MSDG
- FC\*
- STK
- SRL3**
- SRG3
- SRM3
- SRT3
- MRL2
- MRG2
- SM-25
- ShkAbs
- FJ
- FK
- Spd Contr
- Ending

# SRL3-Q Series

## SCP\*3 Internal structure and parts list (φ32 to φ63 equiv.)



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Hexagon socket head cap screw	Alloy steel	Zinc chromate	10	Gasket	Nitrile rubber	
2	Lock lever	Alloy steel	Zinc chromate	11	Position locking mechanism	Aluminum alloy	Alumite
3	Wear ring	Polyacetal resin		12	Adaptor	Steel	Zinc chromate
4	Piston packing	Nitrile rubber		13	Hexagon socket head cap screw	Alloy steel	Zinc chromate
5	Spring	Steel	Electrodeposition	14	Hexagon socket head cap screw	Alloy steel	Zinc chromate
6	Rod packing	Nitrile rubber		15	Hexagon socket set screw	Alloy steel	Zinc chromate
7	Lock pin	Alloy steel	Chrome plating	16	Hexagon nut	Steel	Zinc chromate
8	Rod cover	Aluminum alloy	Alumite	17	Adaptor nut	Alloy steel	Zinc chromate
9	C type snap ring for hole	Steel					

### Repair parts list

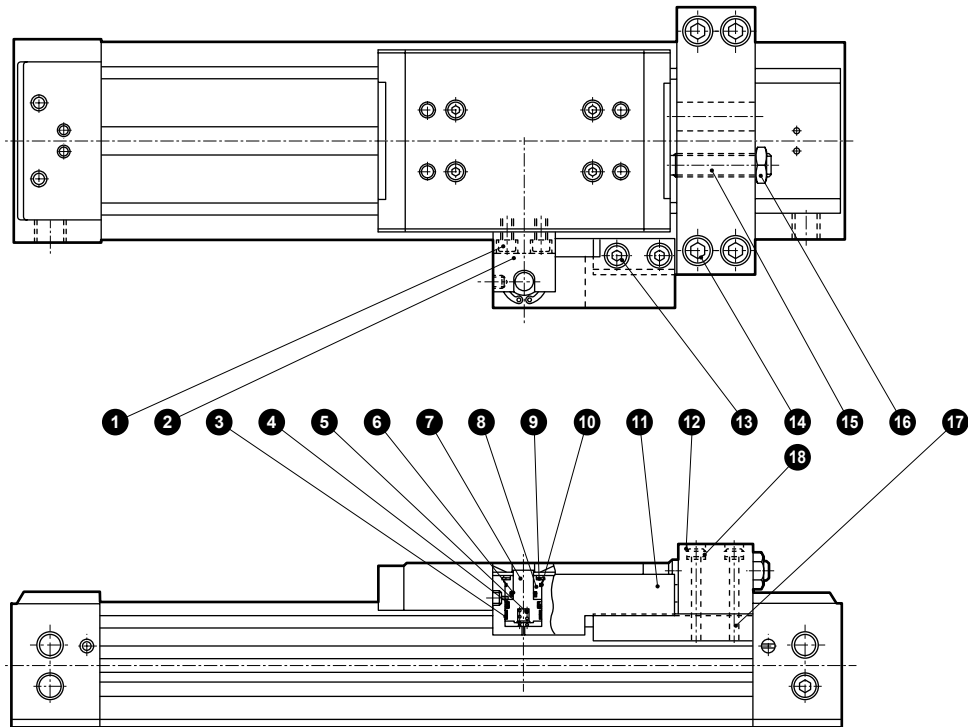
Bore size (mm)	Kit No.	Repair parts No.
φ32 or equiv.	SRL3-Q-32K-*	③ ④ ⑥
φ40 or equiv.	SRL3-Q-40K-*	⑩ ⑧ ⑨ ⑱ ⑳ ㉑
φ50 or equiv.	SRL3-Q-50K-*	㉒ ㉓ ㉔ ㉕ *3
φ63 or equiv.	SRL3-Q-63K-*	

\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.

\*2 : Part numbers ⑧ ⑨ ⑱ ㉑ ㉒ ㉓ ㉔ ㉕ are the same as those on pages 1561 and 1562.

\*3 : ㉕ is only applicable to φ50 equiv./φ63 equiv.

### Internal structure and parts list (φ80, φ100 equiv.)



### Parts list

No.	Part name	Material	Remarks	No.	Part name	Material	Remarks
1	Hexagon socket head cap screw	Alloy steel	Zinc chromate	10	Gasket	Nitrile rubber	
2	Lock lever	Alloy steel	Zinc chromate	11	Position locking mechanism	Aluminum alloy	Alumite
3	Wear ring	Polyacetal resin		12	Adaptor	Steel	Zinc chromate
4	Piston packing	Nitrile rubber		13	Hexagon socket head cap screw	Alloy steel	Zinc chromate
5	Spring	Steel	Electrodeposition	14	Hexagon socket head cap screw	Alloy steel	Zinc chromate
6	Rod packing	Nitrile rubber		15	Hexagon socket set screw	Alloy steel	Zinc chromate
7	Lock pin	Alloy steel	Chrome plating	16	Hexagon nut	Steel	Zinc chromate
8	Rod cover	Aluminum alloy	Alumite	17	Adaptor nut	Alloy steel	Zinc chromate
9	C type snap ring for hole	Steel		18	Conical spring washer	Steel	

### Repair parts list

Bore size (mm)	Kit No.	Repair parts No.
φ80 or equiv.	SRL3-Q-80K-*	③ ④ ⑥ ⑩ ⑧ ⑨ ⑱ ⑳
φ100 or equiv.	SRL3-Q-100K-*	⑳ ㉔ ㉕ ㉖ ㉗ ㉘ ㉙

\*1 : Specify the kit No. when placing an order. Specify the stroke length for \*.

\*2: Part numbers ⑧⑨⑱⑳㉔㉕㉖㉗㉘㉙ are the same as those on page 1563.

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/

COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/

MSDG

FC\*

STK

SRL3

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK


Spd

Contr

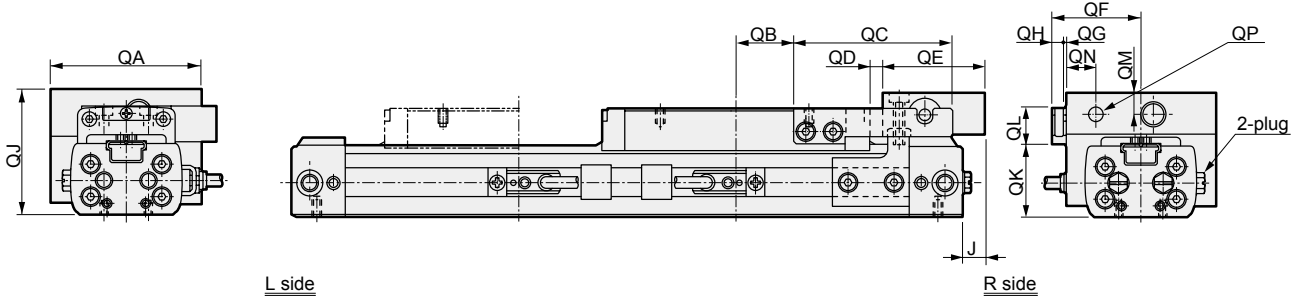
Ending

# SRL3-Q Series

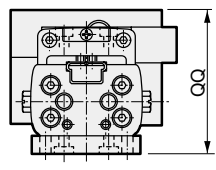
SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVPIN2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

**Dimensions (φ12 to φ25 equiv.)**  \*1: For dimensions other than those below, refer to pages 1564 to 1567.  
\*2: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.


● SRL3-Q



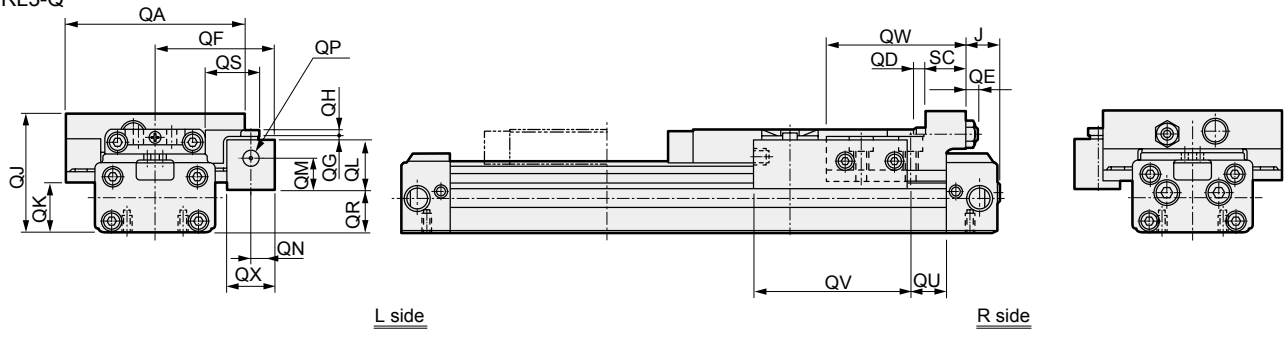
● With foot bracket SRL3-Q-LB1-\*\*-\*\*\*



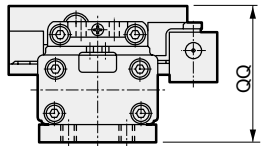
Code	J	QA	QB	QC	QD	QE	QF	QG	QH	QJ	QK	QL	QM	QN	QP	QQ
φ12 or equiv.	0	45	19	46	2.5	25	27.5	1	4	40	21.5	12.5	7	9.5	M5	46
φ16 or equiv.	0	49	19	52	2.5	28	29.5	1	4	42	25	12	7	9.5	M5	48
φ20 or equiv.	-1	57	24	53	2.5	31	33.5	1	4	48	29	13	8	10.5	Rc1/8	56
φ25 or equiv.	5.5	77	26	67.5	2.5	37	43.5	1	4	62.5	36	17	8	10.5	Rc1/8	72.5

**Dimensions (φ32 to φ63 equiv.)**  \*1: For dimensions other than those below, refer to pages 1566 and 1567.  
\*2: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

● SRL3-Q



● With foot bracket SRL3-Q-LB1-32-\*\*\*



Code	J	QA	QD	QE	QF	QG	QH	QJ	QK	QL	QM	QN	QP	QQ	QR	QS	QU	QV	QW	QX	SC
φ32 or equiv.	19.5	98	7	6	65	2	4	66.5	28	27.5	18	13	Rc1/8	88.5	23.5	29	21	84	76	26	22
φ40 or equiv.	11.5	112	7	11	72	2	4	78.5	34	27.5	18	13	Rc1/8	-	31.5	29	27	84	87	26	32
φ50 or equiv.	9.5	136	8	9	84	2	5	99	40	33	21.5	15	Rc1/8	-	42	36	12.5	100	102	30	38
φ63 or equiv.	20.5	158	8	14	95	2	5	112	50	33	21.5	15	Rc1/8	-	55	36	31.5	100	91	30	38

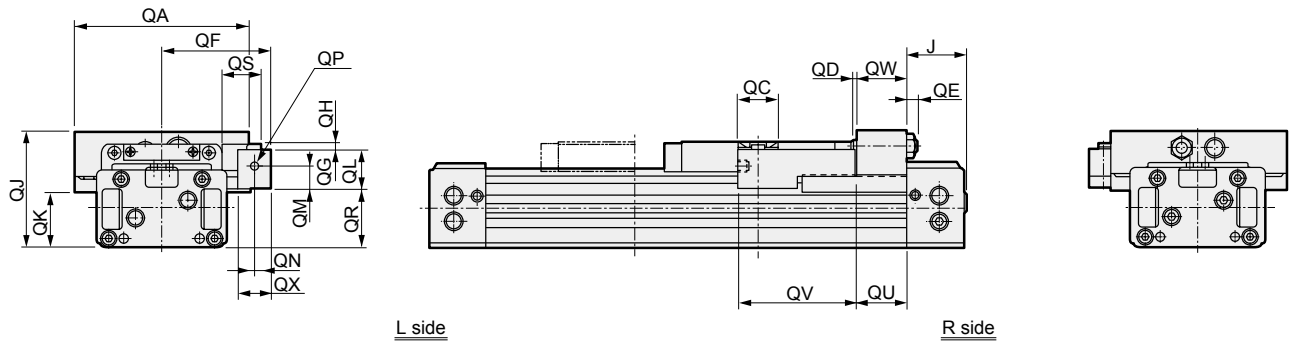
Dimensions (φ80, φ100 equiv.)



\*1: For dimensions other than those below, refer to pages 1568 and 1569.

\*2: For dimensions with options and dimensions of accessories, refer to pages 1570, 1571, 1604 and 1605.

● SRL3-Q



Code	J	QA	QC	QD	QE	QF	QG	QH	QJ	QK	QL	QM	QN	QP	QR	QS	QU	QV	QW	QX
φ80 or equiv.	70	214	50	6	14	133	2	7	145	69	47.5	29	20	Rc1/8	73.5	48	62	143	60	40
φ100 or equiv.	80	250	50	6	14	145	2	7	164	88	47.5	29	20	Rc1/8	92.5	48	62	148	60	40

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/IN2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

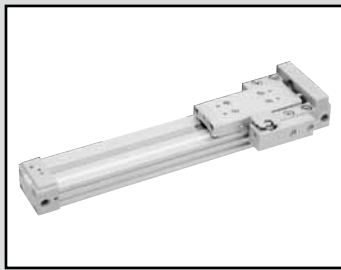
FJ

FK

Spd  
Contr

Ending





Rodless cylinder double acting/resin guide/position locking

# SRL3-GQ Series

- Bore size:  $\phi 12$ ,  $\phi 16$ ,  $\phi 20$ ,  $\phi 25$ ,  $\phi 32$ ,  $\phi 40$ ,  $\phi 50$ ,  $\phi 63$ ,  $\phi 80$ ,  $\phi 100$



## Specifications

Descriptions		SRL3-GQ									
Bore size	mm	$\phi 12$	$\phi 16$	$\phi 20$	$\phi 25$	$\phi 32$	$\phi 40$	$\phi 50$	$\phi 63$	$\phi 80$	$\phi 100$
Actuation		Double acting									
Working fluid		Compressed air									
Max. working pressure	MPa	0.7 ( $\approx 100$ psi, 7 bar)									
Min. working pressure	MPa	0.25 ( $\approx 36$ psi, 2.5 bar)			0.15 ( $\approx 22$ psi, 1.5 bar)			0.1 ( $\approx 15$ psi, 1 bar)			
Proof pressure	MPa	1.05 ( $\approx 150$ psi, 10.5 bar)									
Ambient temperature	$^{\circ}\text{C}$	5 (41 $^{\circ}\text{F}$ ) to 60 (140 $^{\circ}\text{F}$ )									
Port size	Cylinder	M5	Rc1/8		Rc1/4		Rc3/8		Rc1/2		
	Position locking part	M5	Rc1/8								
Stroke tolerance	mm	$^{+2.0}_0$ (to 1000), $^{+2.5}_0$ (to 3000), $^{+3.0}_0$ (to 5000)									
Working piston speed	mm/s	50 to 2000 (standard piping) (*1)									
Cushion		Air cushion									
Lubrication		Not required (use turbine oil class 1 ISO VG32 if necessary for lubrication. Once lubricated, the cylinder will need periodic lubrication.)									
Position locking mechanism		Attached to R side of cover									
Holding force	N	Max. thrust x 0.7									

- \*1: (1) When the piston moves at 500 to 2000 mm/s, reduce the speed when entering the position locking mechanism to 500 mm/s or less. For common port piping, the working piston speed varies depending on the stroke length. Contact CKD.  
 (2) To reduce the speed, add an external shock absorber or deceleration circuit.  
 (3) Apply grease regularly to the sliding part of the lock lever.

## Allowable absorbed energy

Bore size (mm)	Cushioned		Without cushion	With shock absorber (initial set point)	
	Max absorbed energy (J)	Cushion stroke (mm)	Max absorbed energy (J)	Absorbed energy (J)	Effective stroke (mm)
$\phi 12$ or equiv.	0.03	14.5	0.003	2.4	5.5
$\phi 16$ or equiv.	0.22	19.2	0.007	2.4	5.5
$\phi 20$ or equiv.	0.59	22.2	0.010	5.7	7
$\phi 25$ or equiv.	1.40	20.9	0.015	10	9
$\phi 32$ or equiv.	2.57	23.5	0.030	18	13
$\phi 40$ or equiv.	4.27	23.9	0.050	50	16.5
$\phi 50$ or equiv.	9.13	24.9	0.072	86	21
$\phi 63$ or equiv.	17.4	29.6	0.138	86	21
$\phi 80$ or equiv.	40	45.8	0.393	143	25
$\phi 100$ or equiv.	67	45.8	0.622	143	25

## Stroke length

Bore size (mm)	Standard stroke length (mm)	Max. stroke length (mm)	Min. stroke length (mm)
$\phi 12$ equiv.	200/300 400/500 600/700 800/900 1000	5000	5
$\phi 16$ equiv.			
$\phi 20$ equiv.			
$\phi 25$ equiv.			
$\phi 32$ equiv.			
$\phi 40$ equiv.			
$\phi 50$ equiv.			
$\phi 63$ equiv.			
$\phi 80$ equiv.			
$\phi 100$ equiv.			

## Number of installed M type switches and min. stroke length (mm) \* The custom stroke length is available in 1 mm increments.

Switch quantity	1		2		3		4		5		6	
	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H	M*V	M*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 16$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 20$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 25$ or equiv.	10	10	30	70	60	120	90	170	120	220	150	270
$\phi 32$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 40$ or equiv.	10	10	30	45	60	90	90	135	120	180	150	225
$\phi 50$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 63$ or equiv.	15	15	30	45	60	90	90	135	120	180	150	225
$\phi 80$ or equiv.	25		50		100		150		200		250	
$\phi 100$ or equiv.	25		50		100		150		200		250	

## Number of installed T type switches and min. stroke length (mm)

Switch quantity	1		2		3		4		5		6	
	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H	T*V	T*H
Switch model No.												
Bore size (mm)												
$\phi 12$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 16$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 20$ or equiv.	5	5	45	70	85	120	125	170	165	220	205	270
$\phi 25$ or equiv.	10	10	45	70	85	120	125	170	165	220	205	270
$\phi 32$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 40$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 50$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 63$ or equiv.	10	10	45	50	85	100	125	150	165	200	205	250
$\phi 80$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250
$\phi 100$ or equiv.	15	15	45	50	85	100	125	150	165	200	205	250

Be sure to read the Safety Precautions for **Position locking** on pages 1621 to 1626 before use.

## Switch specifications (M type switch)

- 1-color/2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire		
	M2V,M2H	M2WV (2-color display)	M3H/M3V	M3PH/M3PV (custom order)	M3WV
Applications	Dedicated for programmable controller		For programmable controller, relay, IC circuit, compact solenoid valve		
Output method	-		NPN output	PNP output	NPN output
Power supply voltage	-		4.5 to 28 VDC		10 to 28 VDC
Load voltage	10 to 30 VDC		30 VDC or less		
Load current	5 to 30 mA		100 mA or less	100 mA or less	100 mA or less
Indicator lamp	LED (Lit when ON)	Red/green LED (Lit when ON)	LED (Lit when ON)	Yellow LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 μA or less	0.05mA or less	10 μA or less
Weight	g		1 m:22 3 m:57 5 m:93		

Descriptions	Reed 2-wire	
	M0V, M0H	M5V, M5H
Applications	Programmable controller, relay	For programmable controller, relay, IC circuit (without indicator lamp), serial connection
Power supply voltage	-	
Load voltage	12/24 VDC	110 VAC
Load current	5 to 50 mA	7 to 20 mA
Indicator lamp	LED (Lit when ON)	
Leakage current	0 mA	
Weight	g	

\*1 : M0\* switch can be used for 24 VAC and 48 VAC within load current range of 7 to 20 mA.

\*2: Refer to Ending Page 1 for other switch specifications.

## Switch specifications (T type switch)

- 2-color display

Descriptions	Proximity 2-wire		Proximity 3-wire	
	T2YH/T2YV	T2WH/T2WV	T3YH/T3YV	T3WH/T3WV
Applications	Dedicated for programmable controller		For programmable controller, relay	
Output method	-		NPN output	NPN output
Power supply voltage	-		10 to 28 VDC	
Load voltage	10 to 30 VDC	24 VDC ±10%	30 VDC or less	
Load current	5 to 20 mA (*1)		50 mA or less	
Indicator lamp	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)	Red/green LED (Lit when ON)
Leakage current	1 mA or less		10 μA or less	
Weight	g		g	

- For AC magnetic field

Descriptions	Proximity 2-wire	
	T2YD,T2YDT	
Applications	Dedicated for programmable controller	
Indicator lamp	Red/green LED (Lit when ON)	
Load voltage	24 VDC ±10%	
Load current	5 to 20 mA	
Internal voltage drop	6V or less	
Leakage current	1.0 mA or less	
Weight	g	

Note: This switch cannot be used in DC magnetic field.

## Cylinder weight

Unit: kg

Bore size (mm)	Weight for 0 mm stroke length			Mounting bracket weight		Additional weight per St = 100 mm
	Basic (00)	Foot		T type	M type	
		(LB)	(LB1)			
φ12 or equiv.	0.38	0.39	0.40	0.005	0.001	0.10
φ16 or equiv.	0.47	0.48	0.50			0.13
φ20 or equiv.	0.74	0.76	0.80			0.18
φ25 or equiv.	1.5	1.6	1.6			0.28
φ32 or equiv.	2.4	2.5	2.6			0.36
φ40 or equiv.	3.6	3.7	-			0.53
φ50 or equiv.	6.0	6.1	-			0.75
φ63 or equiv.	8.8	9.1	-			1.11
φ80 or equiv.	22.4	23.0	-			2.32
φ100 or equiv.	30.5	31.5	-			3.38

Refer to the weight in the switch specifications.

SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/COVP/N2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd Contr  
Ending

# SRL3-GQ Series

## How to order

Without switch (built-in magnet for switch)

**SRL3-GQ-00-12B-200-B**

With switch (built-in magnet for switch)

**SRL3-GQ-00-12B-200-M0H-R-B**

**A** Mounting  
\*1, \*2

**B** Bore size

**C** Port thread

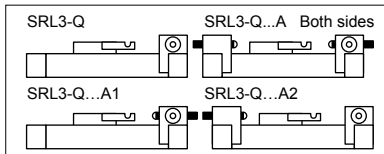
**D** Cushion

**E** Stroke length

**F** Switch model No.

### ⚠ Precautions for model No. selection

- \*1 : Mounting bracket will be shipped assembled with the product.
- \*2 : For 12, 16, 20, 25 and 32 bore sizes with option code "R" or "T", the mounting will be "00" or "LB1".  
(Piping with "LB" is not possible for option codes "R" and "T".)
- \*3 : Refer to page 1596 for the min. stroke length with switch.
- \*4 : Switches other than **F** Switch model No. are also available. (Custom order) Refer to Ending Page 1 for details.
- \*5 : The full stroke length adjusting bracket on R side is provided as standard for the position locking. Therefore, if "A1" is selected, a shock absorber only is added to R side. In the case of "A", R side is position locking and full stroke length adjustable with shock absorber, and L side is full stroke length adjustable with shock absorber. (Figure below)



- \*6 : "\*" of L\* and N\* indicates the number of sets. When more than one set are necessary, specify "L2" (for LB) or "N2" (for LB1). 2 pcs./set
- \*7 : For the port and cushion needle position codes, refer to dimensions on pages 1580 to 1584.
- \*8 : In the case of the standard with φ12 to φ25, remove the cover, attach a flat nut and install the full stroke length adjusting bracket. A flat nut is attached to option "A3" to enable retrofitting the full stroke length adjusting bracket without removing the cover.
- \*9 : In "H", the thread size for φ12 and φ16 will be "M4" and that for φ20 will be "M5".
- \*10 : Check the option combinations in "Option selection table" on the next page.
- \*11 : Copper and PTFE free as standard. (except for type with shock absorber)

[Example of model No.]

**SRL3-GQ-00-12B-200-M0H-R-B**

Model: Rodless cylinder Resin guide/position locking

- A** Mounting : Basic
- B** Bore size : φ12 mm
- C** Port thread : Rc thread
- D** Cushion : Both sides cushioned
- E** Stroke length : 200 mm
- F** Switch model No. : Reed M0H switch, lead wire 1 m
- G** Switch quantity : 1 on R side
- H** Option : Port position F, cushion needle position B

Code	Content											
<b>A Mounting</b>												
00	Basic											
LB	Axial foot											
LB1	Axial foot (φ12 to φ32 only)											
<b>B Bore size (mm)</b>												
12	φ12											
16	φ16											
20	φ20											
25	φ25											
32	φ32											
40	φ40											
50	φ50											
63	φ63											
80	φ80											
100	φ100											
<b>C Port thread</b>												
Blank	Rc thread											
N	NPT thread (φ20 or more) (custom order product)											
G	G thread (φ20 or more) (custom order product)											
<b>D Cushion</b>												
B	Both sides cushioned											
R	R side cushioned											
L	L side cushioned											
N	Without cushion											
<b>E Stroke length (mm)</b>												
Bore size	Stroke length *3	Custom stroke length										
φ12 to φ100	5 to 5000	In 1 mm increments										
<b>F Switch model No.</b>												
Axial lead wire	Radial lead wire	Reed Contact	Voltage	Indicator lamp	Lead wire							
M0H*	M0V*	● ●	AC DC	1-color display	2-wire							
M5H*	M5V*		● ●	Without indicator lamp								
M2H*	M2V*	● ●	● ●	1-color display	2-wire							
-	M2WV*		● ●	2-color display								
M3H*	M3V*	● ●	● ●	1-color display	3-wire							
-	M3WV*		● ●	2-color display								
M3PH*	M3PV*	● ●	● ●	1-color display (custom)	3-wire							
T2WH*	T2WV*		● ●	2-color display								
T2YH*	T2YV*	● ●	● ●	2-color display	2-wire							
T3WH*	T3WV*		● ●	2-color display								
T3YH*	T3YV*	● ●	● ●	2-color display	3-wire							
T2YD*	-		● ●	2-color display								
T2YDT*	-	● ●	● ●	AC magnetic field	2-wire							
<b>* Lead wire length</b>												
Blank	1 m (standard)											
3	3 m (option)											
5	5 m (option)											
<b>G Switch quantity</b>												
R	1 on R side											
L	1 on L side											
D	2											
T	3											
4	4 (when there are more than 4 switches, indicate switch quantity.)											
<b>H Option</b>												
			Bore size (φ)									
			12	16	20	25	32	40	50	63	80	100
A	Both-sides full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A1	R side full stroke adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A2	L side full stroke, adjustable, shock absorber		●	●	●	●	●	●	●	●	●	●
A3	Full stroke adjustable, adjusting bracket to be added		●	●	●	●						
L*	Intermediate support bracket (for 00, LB)		●	●	●	●	●	●	●	●	●	●
N*	Intermediate support bracket (for LB1)		●	●	●	●	●					
H	Larger thread for table installation		●	●	●							
U	Height adjustment plate		●	●	●	●	●	●	●	●	●	●
Blank	:F (Standard)		●	●	●	●	●	●	●	●	●	●
R	:R (Common port)		●	●	●	●	●	●	●	●	●	●
B	:F		●	●	●	●	●	●	●	●	●	●
T	:R (Common port)		●	●	●	●	●	●	●	●	●	●
D	:D					●	●	●	●	●	●	●
S	:D						●	●	●	●	●	●
X	:F (Common port)											●

### Option selection table

● Available    □ Not available

Option	Option															
	Code	A	A1	A2	A3	L*	N*	H	U	Blank	R	B	T	D	S	X
		Both side full stroke length adjustable, with shock absorber	R side full stroke length adjustable, with shock absorber	L side full stroke length adjustable, with shock absorber	Full stroke length adjustable with adjusting bracket to be added later	Intermediate support bracket (for 00, LB)	Intermediate support bracket (for LB1)	Larger thread for table installation	Height adjustment plate	Port position F, cushion needle position F (standard)	Port position R, cushion needle position F (common port)	Port position F, cushion needle position B	Port position R, cushion needle position B (common port)	Port position D, cushion needle position F	Port position D, cushion needle position D	Port position F, cushion needle position F (common port)
A	●															
A1		●														
A2			●													
A3				●												
L*					●											
N*						●										
H							●									
U								●								
Blank									●							
R										●						
B											●					
T												●				
D													●			
S														●		
X															●	

\*1: Some combinations are not available depending on the bore size. Be sure to check the **H** Option in "How to order" on the previous page.

\*2: LB1 with port position D is not possible. (φ25, φ32)

### Theoretical thrust table

(Unit: N)

Bore size (mm)	Operating direction	Working pressure MPa							
		0.1	0.15	0.2	0.3	0.4	0.5	0.6	0.7
φ12	Push/Pull	-	-	27.7	41.5	55.3	69.1	83.0	96.8
φ16	Push/Pull	-	-	43.2	64.8	86.4	1.08 × 10 <sup>2</sup>	1.30 × 10 <sup>2</sup>	1.51 × 10 <sup>2</sup>
φ20	Push/Pull	-	-	62.9	94.4	1.26 × 10 <sup>2</sup>	1.57 × 10 <sup>2</sup>	1.89 × 10 <sup>2</sup>	2.20 × 10 <sup>2</sup>
φ25	Push/Pull	54.2	81.4	1.08 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.17 × 10 <sup>2</sup>	2.71 × 10 <sup>2</sup>	3.25 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>
φ32	Push/Pull	81.4	1.22 × 10 <sup>2</sup>	1.63 × 10 <sup>2</sup>	2.44 × 10 <sup>2</sup>	3.26 × 10 <sup>2</sup>	4.07 × 10 <sup>2</sup>	4.88 × 10 <sup>2</sup>	5.70 × 10 <sup>2</sup>
φ40	Push/Pull	1.27 × 10 <sup>2</sup>	1.90 × 10 <sup>2</sup>	2.53 × 10 <sup>2</sup>	3.80 × 10 <sup>2</sup>	5.06 × 10 <sup>2</sup>	6.33 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	8.86 × 10 <sup>2</sup>
φ50	Push/Pull	1.99 × 10 <sup>2</sup>	2.98 × 10 <sup>2</sup>	3.98 × 10 <sup>2</sup>	5.96 × 10 <sup>2</sup>	7.95 × 10 <sup>2</sup>	9.94 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.39 × 10 <sup>3</sup>
φ63	Push/Pull	3.14 × 10 <sup>2</sup>	4.70 × 10 <sup>2</sup>	6.27 × 10 <sup>2</sup>	9.41 × 10 <sup>2</sup>	1.25 × 10 <sup>3</sup>	1.57 × 10 <sup>3</sup>	1.88 × 10 <sup>3</sup>	2.20 × 10 <sup>3</sup>
φ80	Push/Pull	5.06 × 10 <sup>2</sup>	7.60 × 10 <sup>2</sup>	1.01 × 10 <sup>3</sup>	1.52 × 10 <sup>3</sup>	2.03 × 10 <sup>3</sup>	2.53 × 10 <sup>3</sup>	3.04 × 10 <sup>3</sup>	3.54 × 10 <sup>3</sup>
φ100	Push/Pull	7.91 × 10 <sup>2</sup>	1.19 × 10 <sup>3</sup>	1.58 × 10 <sup>3</sup>	2.37 × 10 <sup>3</sup>	3.16 × 10 <sup>3</sup>	3.95 × 10 <sup>3</sup>	4.74 × 10 <sup>3</sup>	5.53 × 10 <sup>3</sup>

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd Contr

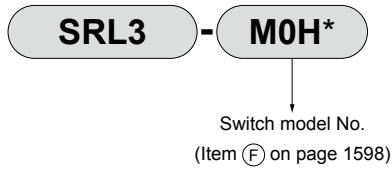
Ending

# SRL3-GQ Series

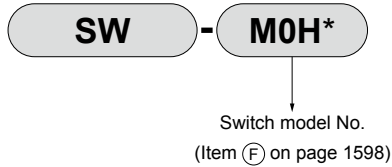
SCP\*3  
CMK2  
CMA2  
SCM  
SCG  
SCA2  
SCS2  
CKV2  
CAV2/  
COVPIN2  
SSD2  
SSG  
SSD  
CAT  
MDC2  
MVC  
SMG  
MSD/  
MSDG  
FC\*  
STK  
SRL3  
SRG3  
SRM3  
SRT3  
MRL2  
MRG2  
SM-25  
ShkAbs  
FJ  
FK  
Spd  
Contr  
Ending

## How to order switch (For configurations, refer to pages 1606 to 1608)

- Switch body + mounting bracket set (\*1)



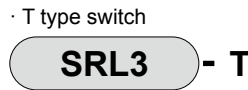
- Switch body only



* Lead wire length	
Blank	1 m (standard)
3	3 m (option)
5	5 m (option)

\* indicates lead wire length.

- Mounting bracket set (\*2)



Note: The mounting bracket is different between the M type switch and T type switch.

- Lead wire holder (\*3)

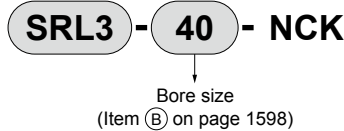


\*1: "Switch body + mounting bracket set" does not include lead wire holders. Order lead wire holders separately if necessary.

\*2: The mounting bracket is different between the M type switch and T type switch.

\*3: The quantity of lead wire holders per set is 10.

- How to order discrete shock absorber



(One shock absorber, one shock absorber fixing hexagon nut)

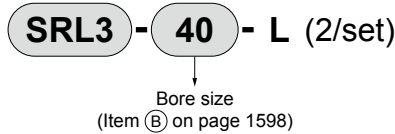
(Note) The shock absorber fixing hexagon nut for SRL3-40 is a custom order product.

Applicable shock absorber model No.

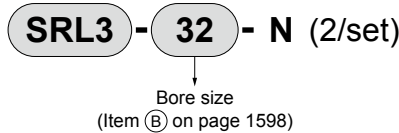
Model	Shock absorber model No.
SRL3-12	NCK-00-0.3-C
SRL3-16	NCK-00-0.3-C
SRL3-20	NCK-00-0.7-C
SRL3-25	NCK-00-1.2
SRL3-32	NCK-00-2.6
SRL3-40	NCK-00-7
SRL3-50	NCK-00-12
SRL3-63	NCK-00-12
SRL3-80	NCK-00-20
SRL3-100	NCK-00-20

- How to order discrete intermediate support bracket

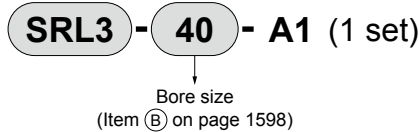
For 00/LB



For LB1

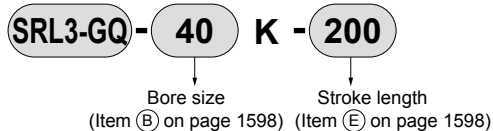


- How to order full stroke length adjusting bracket kit

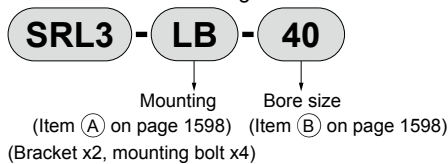


(For configurations, refer to "Full stroke length adjusting bracket kit" on page 1607.)

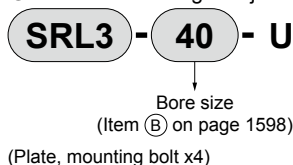
- How to order repair parts



- How to order mounting bracket



- How to order height adjustment plate set



## Internal structure and parts list

For the internal structure and parts list, refer to:  
 SRL3 Series      Pages 1561 to 1563  
 SRL3-G Series    Pages 1577 to 1579  
 SRL3-Q Series    Pages 1591 to 1593.

## Repair parts list

Bore size (mm)	Kit No.	Repair parts No.		
φ12 or equiv.	SRL3-GQ-12K-*	8 9 18 21 22 26	4 6 10	1 5
φ16 or equiv.	SRL3-GQ-16K-*	27		
φ20 or equiv.	SRL3-GQ-20K-*	(The same as part numbers on page 1561.)	(The same as part numbers on page 1591.)	(The same as part numbers on page 1577.)
φ25 or equiv.	SRL3-GQ-25K-*			
φ32 or equiv.	SRL3-GQ-32K-*	8 9 18 21 22 26	3 4 6 10	1 5
φ40 or equiv.	SRL3-GQ-40K-*	27		
φ50 or equiv.	SRL3-GQ-50K-*	(The same as part numbers on page 1561.)	(The same as part numbers on page 1592.)	(The same as part numbers on page 1577.)
φ63 or equiv.	SRL3-GQ-63K-*	8 9 18 21 22 26	3 4 6 10	1 5
φ63 or equiv.	SRL3-GQ-63K-*	27 32		
φ63 or equiv.	SRL3-GQ-63K-*	(The same as part numbers on page 1562.)	(The same as part numbers on page 1592.)	(The same as part numbers on page 1578.)
φ80 or equiv.	SRL3-GQ-80K-*	8 9 18 21 22 26	3 4 6 10	1
φ80 or equiv.	SRL3-GQ-80K-*	27 28 29 32 33		
φ100 or equiv.	SRL3-GQ-100K-*	(The same as part numbers on page 1563.)	(The same as part numbers on page 1593.)	(The same as part numbers on page 1579.)

## Dimensions

SRL3 Series      Pages 1564 to 1569  
 SRL3-G Series    Pages 1580 to 1585  
 SRL3-Q Series    Pages 1594 and 1595.

SCP*3
CMK2
CMA2
SCM
SCG
SCA2
SCS2
CKV2
CAV2/COVP/N2
SSD2
SSG
SSD
CAT
MDC2
MVC
SMG
MSD/MSDG
FC*
STK
<b>SRL3</b>
SRG3
SRM3
SRT3
MRL2
MRG2
SM-25
ShkAbs
FJ
FK
Spd Contr
Ending

# SRL3-Q Series

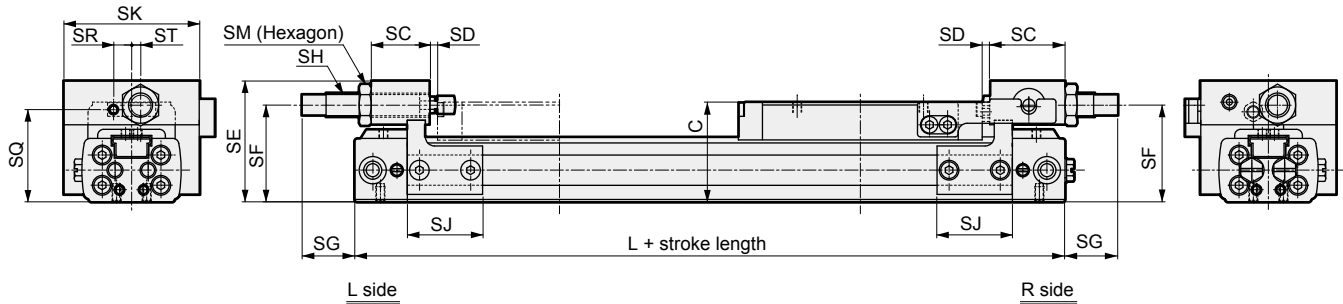
## SRL3-Q Series common dimensions

● Full stroke length adjustable with shock absorber

Note: In the case of option A or A1, adjust the stroke length on the position locking side by adjusting the stroke length of the entire unit. Do not perform fine adjustment using the shock absorber and hexagon socket set screw.

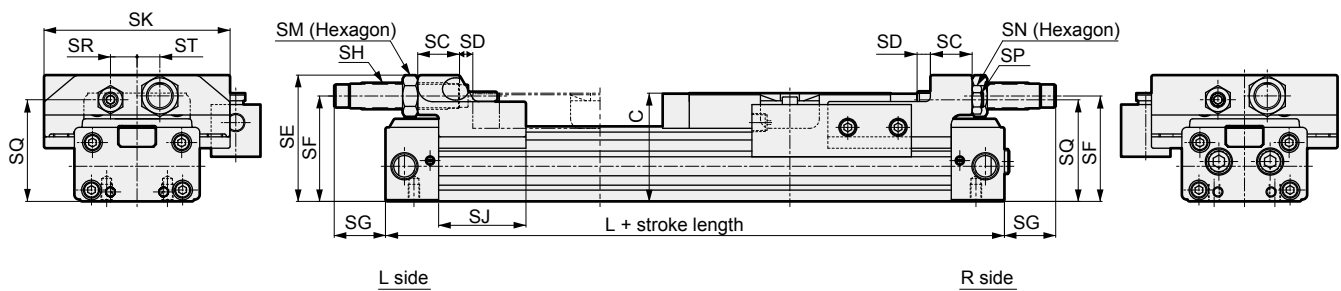
Fine adjustment with the shock absorber and hexagon socket set screw will cause the lock lever and the position locking mechanism to be misaligned, which prevents secure locking.

·φ12 to φ25 or equiv.



Code	SC	SD	SE	SF	SG			SH		SJ	SK	SM	SN	SP	SQ	SR	ST	C	L
					At max.	At min.	Adj range	Thread size	Max. absorbed energy (J)										
φ12 or equiv.	19.5	2.5	40	32	17.5	7.5	10	M8×0.75	3	25	45	12	5.5	M3	30.5	6	3	33	136
φ16 or equiv.	18	4	42	35	14.5	4.5	10	M8×0.75	3	25	49	12	5.5	M3	34	6	4	37	149
φ20 or equiv.	22.5	3.5	48	40	14.5	4.5	10	M10×1.0	7	39	57	14	7	M4	38	8	5	42	169
φ25 or equiv.	20	2.5	62.5	51.5	14.5	4.5	10	M12×1.0	12	50	77	17	10	M6	50	12	10	53	190

·φ32 to φ63 or equiv.



Code	SC	SD	SE	SF	SG			SH		SJ	SK	SM	SN	SP	SQ	SR	ST	C	L
					At max.	At min.	Adj range	Thread size	Max. absorbed energy (J)										
φ32 or equiv.	22	7	66.5	55.5	27	17	10	M14×1.5	26	46	98	19	13	M8	53.5	14	12	57	226
φ40 or equiv.	32	7	78.5	65.5	34	24	10	M20×1.5	70	51	112	24	17	M10	63.5	17	12	67	244
φ50 or equiv.	38	8	99	80	55	45	10	M25×1.5	120	53	136	32	19	M12	77.5	22	17	82	258
φ63 or equiv.	38	8	112	93.5	44	34	10	M25×1.5	120	64	158	32	24	M16	89	25	20	95	296

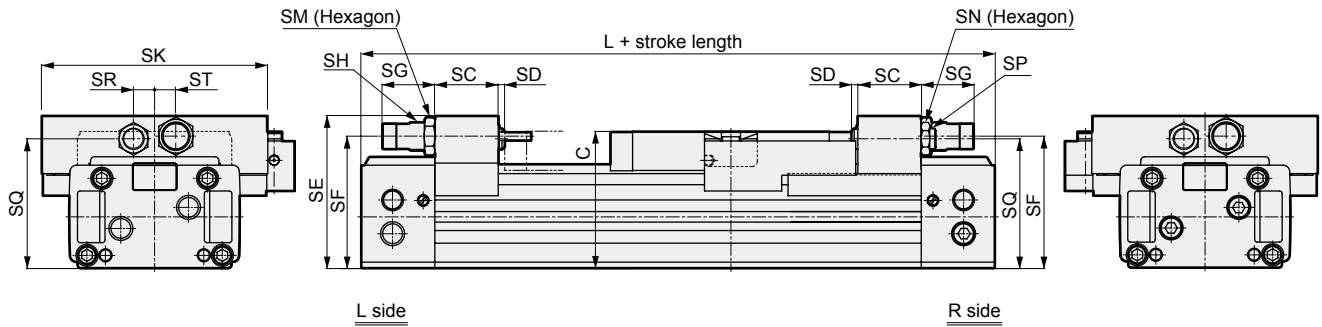
## SRL3-Q Series common dimensions

● Full stroke length adjustable with shock absorber

Note: In the case of option A or A1, adjust the stroke length on the position locking side by adjusting the stroke length of the entire unit. Do not perform fine adjustment using the shock absorber and hexagon socket set screw.

Fine adjustment with the shock absorber and hexagon socket set screw will cause the lock lever and the position locking mechanism to be misaligned, which prevents secure locking.

·φ80 to φ100 or equiv.



Code	SC	SD	SE	SF	SG			SH		SK	SM	SN	SP	SQ	SR	ST	C	L
					At max.	At min.	Adj. range	Thread size	Max. absorbed energy (J)									
φ80 or equiv.	60	6	145	125.5	50	40	10	M27×1.5	200	214	32	27	M20	123	20	20	130	500
φ100 or equiv.	60	6	164	144.5	50	40	10	M27×1.5	200	250	32	27	M20	142	20	20	150	530

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd  
Contr

Ending

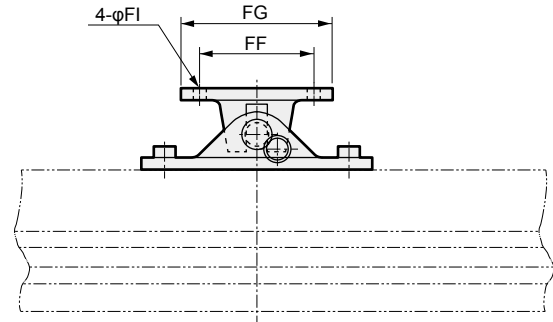
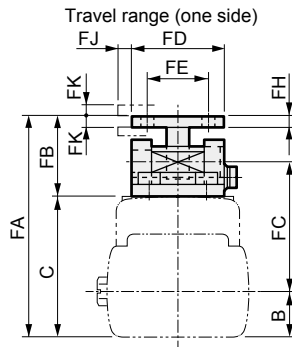
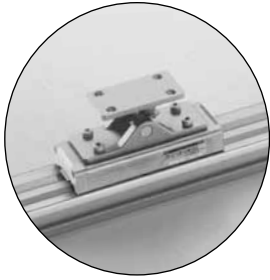


# SRL3 Series

## SRL3 Series common option dimensions

### ● Floating fitting (Y)

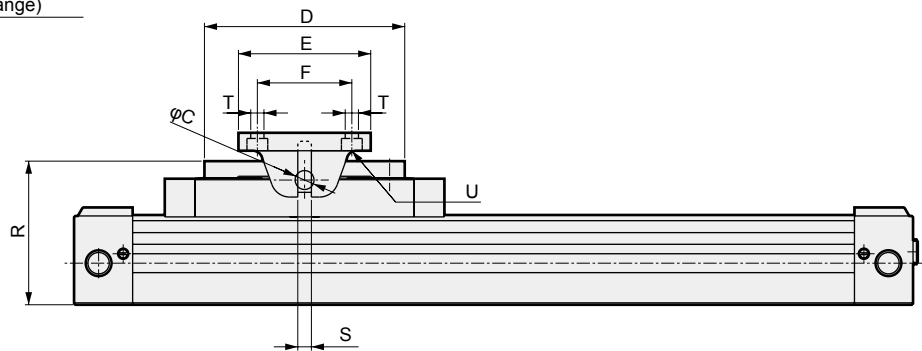
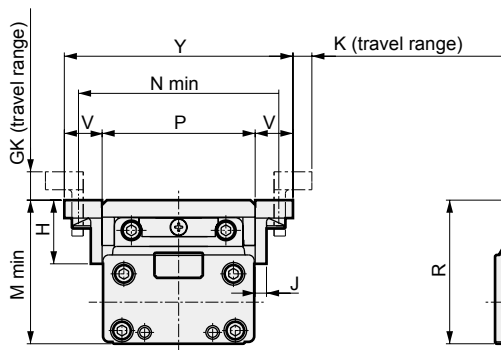
Material: Steel  
Zinc chromate treatment



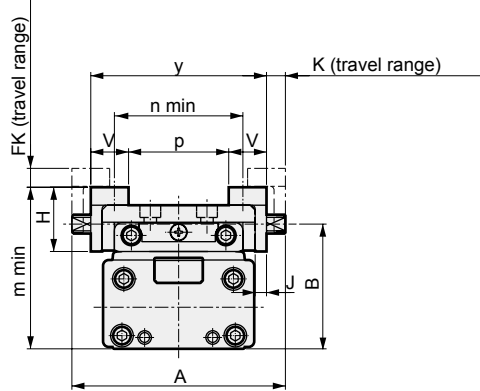
Code	FA	FB	FC	FD	FE	FF	FG	FH	FI	FJ	FK	B	C
φ12 or equiv.	54	21	31.5	24	16	30	40	3	3.4	3	3	10.5	33
φ16 or equiv.	58	21	34	24	16	30	40	3	3.4	3	3	12	37
φ20 or equiv.	67	25	39	30	20	40	56	4	4.5	3	3	14	42
φ25 or equiv.	78	25	47	30	20	40	56	4	6	3	3	17	53
φ32 or equiv.	95	38	55.5	45	30	50	70	6	7	5	5	18.5	57

Code	FA	FB	FC	FD	FE	FF	FG	FH	FI	FJ	FK	B	C
φ40 or equiv.	105	38	62	45	30	50	70	6	7	5	5	22	67
φ50 or equiv.	126	44	73	60	40	70	90	8	9	5	5	28	82
φ63 or equiv.	139	44	79	60	40	70	90	8	9	5	5	35	95
φ80 or equiv.	188	58	107	80	50	90	120	11	14	10	5	49	130
φ100 or equiv.	220	70	120.5	90	60	110	140	13	14	10	5	61.5	150

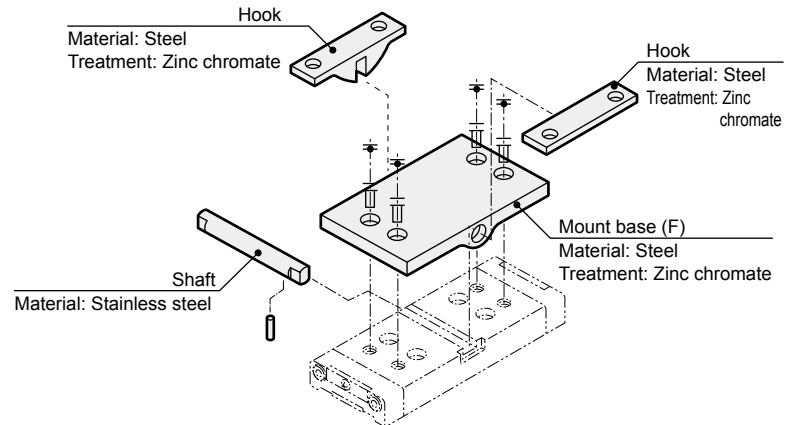
### ● Thin floating fitting (Y1) φ12 to φ63



[Hooks facing outside]



[Hooks facing inside]



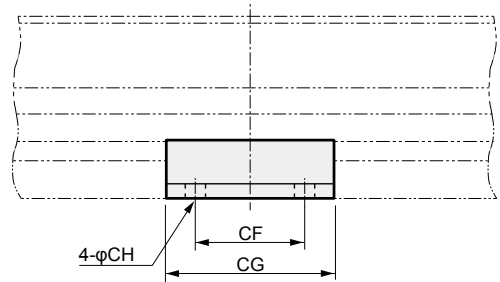
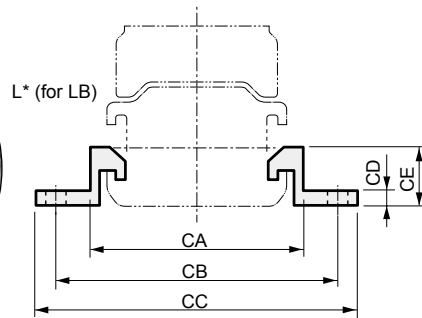
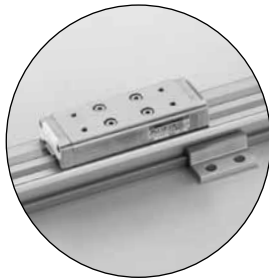
Code	A	B	C	D	E	F	H	J	K	FK	GK	M min	m min	N min	n min	P	p	R	S	V	Y	y	T	U
φ12	52	32	5	60	40	30	20	3	6	6	9	38	43	47.5	26.5	34	16	38	3.5	12	58	40	φ3.4	φ6.5 spot face depth 3.3
φ16	56	36.5	5	60	40	30	20	3	6	6	9	42	47	51.5	30.5	38	20	42	3.5	12	62	44	φ3.4	φ6.5 spot face depth 3.3
φ20	64	41	6	84	56	40	24.5	4	6	6	9	48.5	56.5	62	34	44	22	48.5	4	15	74	52	φ4.5	φ8 spot face depth 4.4
φ25	74	53	6	84	56	40	24.5	4	6	6	9	60.5	68.5	72	44	54	32	60.5	4	15	84	62	φ5.5	φ9.5 spot face depth 5.4
φ32	99	56.5	8	106	70	50	34	6	10	10	15	66	75.5	92	54	67	39	66	5.5	20	107	79	φ6.6	φ11 spot face depth 6.5
φ40	113	66	10	116	70	50	34	6	10	10	15	76	85.5	106	68	81	53	76	7	20	121	93	φ6.6	φ11 spot face depth 6.5
φ50	133	81	12	120	90	70	43	8	10	10	15	93	106	129	81	97	63	93	8.5	25	147	113	φ9	φ14 spot face depth 8.6
φ63	155	94	14	136	90	70	43	8	10	10	15	107	120	151	103	119	85	107	10	25	169	135	φ9	φ14 spot face depth 8.6

### SRL3 Series common option dimensions



- Intermediate support bracket (L\*N\*)  
(auxiliary bracket for preventing sag)

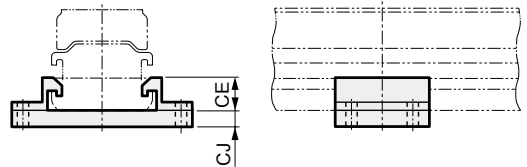
Material: Aluminum alloy  
Alumite treatment



Code	CA	CB	CC	CD	CE	CF	CG	CH	CJ
φ12 or equiv.	38	52	60	3	11	16	30	4	6
φ16 or equiv.	42	56	64	3	12	20	35	4	6
φ20 or equiv.	49	64	75	4	14	20	38	5	8
φ25 or equiv.	60	76	88	6	19.5	20	40	7	10
φ32 or equiv.	74	88	100	6	21.5	20	40	7	10
φ40 or equiv.	90	108	124	6	24.5	30	60	9	-
φ50 or equiv.	106	124	140	8	30.5	30	60	9	-
φ63 or equiv.	130	152	172	10	38.5	50	90	11	-
φ80 or equiv.	172	210	236	12	32	60	110	14	-
φ100 or equiv.	208	246	272	12	32	60	110	14	-

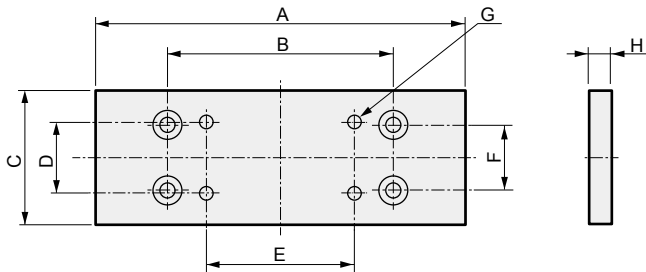
L\* (for 00/LB)N\* (for LB1)

N\* (for LB1)



- Height adjustment plate (U)

Material: Aluminum alloy  
Alumite treatment



Code	A	B	C	D	E	F	G	H
φ 12	80	42	29	16	30	13	4-M3 through	8
φ 16	87	48	32	16	30	15	4-M3 through	6
φ 20	99	60	38	20	40	18	4-M4 through	7
φ 25	121	70	48	20	40	20	4-M5 through	10.5
φ 32	134	80	56	30	50	20	4-M6 through	10.5
φ 40	147	90	68	30	50	30	4-M6 through	12.5
φ 50	151	100	80	40	70	30	4-M8 through	18
φ 63	167	110	102	40	70	40	4-M8 through	18
φ 80	227	150	146	50	90	50	4-M12 through	18
φ100	237	160	170	60	110	60	4-M12 through	18

SCP\*3

CMK2

CMA2

SCM

SCG

SCA2

SCS2

CKV2

CAV2/  
COVP/N2

SSD2

SSG

SSD

CAT

MDC2

MVC

SMG

MSD/  
MSDG

FC\*

STK

**SRL3**

SRG3

SRM3

SRT3

MRL2

MRG2

SM-25

ShkAbs

FJ

FK

Spd  
Contr

Ending