

# Hygienic Design Cylinder Round Type

# HYB Series

ø20, ø25, ø32, ø40, ø50, ø63, ø80, ø100

## How to Order

**HYB 20 [ ] R - 50 F**

**With auto switch** **HYDB 20 [ ] R - 50 F - H7BAL [ ]**

**With auto switch (Built-in magnet)**

**Bore size**

20	20 mm
25	25 mm
32	32 mm
40	40 mm
50	50 mm
63	63 mm
80	80 mm
100	100 mm

**Port thread type**

Nil	M thread	ø20, ø25
	Rc	
TN	NPT	ø32 to ø100
TF	G	

**Sealant material**

R	NBR
H	External FKM <sup>(Note)</sup>

(Note) External seal material:  
Rod scraper, tube gasket, and rod seal are made from FKM.

**Number of auto switches**

Nil	2 pcs.
S	1 pc.
n	"n" pcs.

**Auto switch**

Nil	Without auto switch (Built-in magnet)
-----	---------------------------------------

Refer to table below for selection of applicable auto switch.

**Grease**

Nil	Standard grease (for non-food)
F	Grease for food

(Note) Select grease for food for use in a water dispersion environment or when washing a product with water.  
(Water resistance is insufficient with standard grease.)

**Cylinder stroke**

Refer to page 1085 for the standard stroke.

< Mounting bracket > Foot and flange (Rod end)  
< Option parts > Plug bolt  
Please place an order for above mentioned parts separately, please refer to pages 1115 to 1119 for details.

### Applicable Auto Switches/Refer to pages 1575 to 1701 for detailed auto switch specifications.

Type	Special function	Electrical entry	Indicator light	Wiring (Output)	Load voltage		Auto switch model		Lead wire length (m)*		Pre-wired connector	Applicable load
					DC	ø20 to ø63	ø80, ø100	3 (L)	5 (Z)			
<b>Solid state auto switch</b>	Water resistance improvement product (2-color display)	Grommet	Yes	2-wire	24 V	12 V	<b>H7BA</b>	<b>G5BA</b>	●	○	○	Relay, PLC

\* Lead wire length symbols  
3 m..... L (Example) H7BAL  
5 m..... Z (Example) H7BAZ

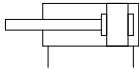
\* Auto switches marked with a "○" symbol are produced upon receipt of orders.

\* Refer to pages 1648 and 1649 for detailed specifications about the auto switch with pre-wired connector.



**Symbol**

Rubber bumper



**Specifications**

Bore size (mm)	<b>20</b>	<b>25</b>	<b>32</b>	<b>40</b>	<b>50</b>	<b>63</b>	<b>80</b>	<b>100</b>
Action	Double acting, Single rod							
Fluid	Air							
Minimum operating pressure	0.2 MPa		0.15 MPa			0.07 MPa		
Maximum operating pressure	1.0 MPa							
Proof pressure	1.5 MPa							
Ambient and operating fluid temperature	Without auto switch 0°C to 70°C							
	With auto switch 0°C to 60°C							
Lubrication	Not required							
Piston speed	50 to 500 mm/s (With pressure at 1.0 MPa) <sup>Note)</sup>							
Cushion	Rubber bumper							
Stroke length tolerance	+1.4 0 mm							
Piston rod material	Stainless steel 304 / Hard chrome plated							

CJ5  
CG5

HY□

Water  
Resistant

Note) Use a cylinder below the allowable kinetic energy. Refer to page 1086 for the allowable kinetic energy.

**Standard Stroke**

Bore size (mm)	Standard stroke (mm)
<b>20</b>	25, 50, 75, 100, 125, 150, 200
<b>25 to 100</b>	25, 50, 75, 100, 125, 150, 200, 250, 300

\* Intermediate strokes of 1 mm each can be produced. (The spacer is not used.)

**Weight**

**Without auto switch**

Unit: kg

Bore size (mm)	Stroke (mm)									
	25	50	75	100	125	150	175	200	250	300
<b>20</b>	0.15	0.17	0.18	0.20	0.22	0.24	0.26	0.27	—	—
<b>25</b>	0.20	0.22	0.24	0.27	0.29	0.31	0.34	0.36	0.40	0.45
<b>32</b>	0.26	0.29	0.32	0.35	0.38	0.41	0.44	0.47	0.53	0.59
<b>40</b>	0.50	0.55	0.59	0.64	0.68	0.73	0.78	0.82	0.91	1.01
<b>50</b>	0.88	0.95	1.02	1.09	1.15	1.22	1.29	1.35	1.49	1.62
<b>63</b>	1.21	1.29	1.38	1.47	1.55	1.64	1.72	1.81	1.98	2.15
<b>80</b>	2.01	2.13	2.24	2.35	2.47	2.58	2.69	2.81	3.03	3.26
<b>100</b>	3.52	3.68	3.84	3.99	4.15	4.31	4.47	4.63	4.95	5.27

**With auto switch (Built-in magnet)**

Unit: kg

Bore size (mm)	Stroke (mm)									
	25	50	75	100	125	150	175	200	250	300
<b>20</b>	0.15	0.17	0.19	0.21	0.22	0.24	0.26	0.28	—	—
<b>25</b>	0.20	0.22	0.25	0.27	0.29	0.32	0.34	0.36	0.41	0.46
<b>32</b>	0.28	0.31	0.33	0.36	0.39	0.42	0.45	0.48	0.54	0.60
<b>40</b>	0.51	0.56	0.61	0.65	0.70	0.74	0.79	0.83	0.93	1.02
<b>50</b>	0.90	0.97	1.03	1.10	1.17	1.23	1.30	1.37	1.50	1.64
<b>63</b>	1.23	1.32	1.40	1.49	1.58	1.66	1.75	1.83	2.00	2.17
<b>80</b>	2.04	2.16	2.27	2.38	2.50	2.61	2.72	2.84	3.06	3.29
<b>100</b>	3.55	3.71	3.87	4.03	4.19	4.35	4.51	4.67	4.98	5.30

**Theoretical Output**

Unit: N

Bore size (mm)	Operating direction	Operating pressure (MPa)		
		0.3	0.5	0.7
<b>20</b>	OUT	94.2	157	220
	IN	79.2	132	185
<b>25</b>	OUT	147	246	344
	IN	124	206	288
<b>32</b>	OUT	241	402	563
	IN	207	346	484
<b>40</b>	OUT	378	630	882
	IN	318	530	742
<b>50</b>	OUT	588	980	1370
	IN	495	825	1160
<b>63</b>	OUT	936	1560	2180
	IN	840	1400	1960
<b>80</b>	OUT	1510	2520	3520
	IN	1360	2270	3180
<b>100</b>	OUT	2360	3930	5500
	IN	2150	3580	5010

D-□

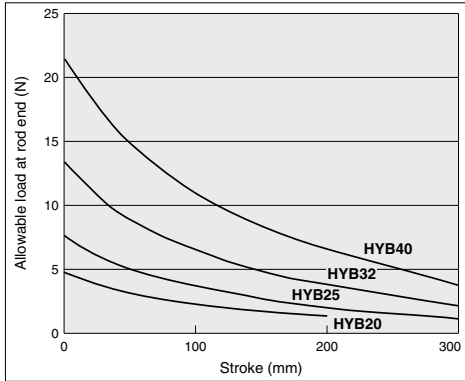
-X□

Technical  
Data

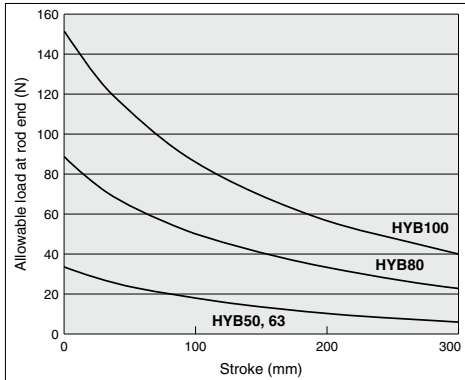
# HYB Series

## Allowable Load at Rod End

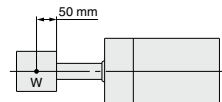
ø20, ø25, ø32, ø40



ø50, ø63, ø80, ø100

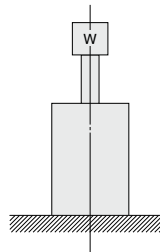
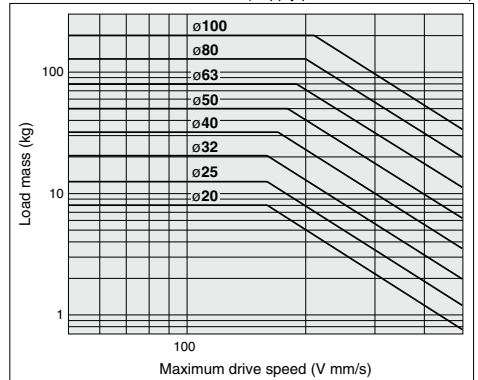


• A case where the center of gravity of the load rests 50 mm from the rod end.



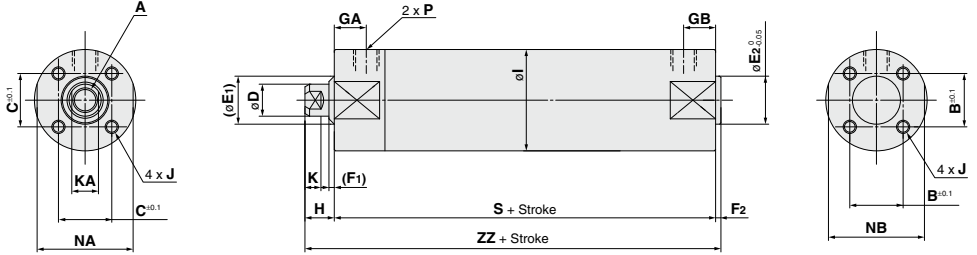
## Allowable Kinetic Energy

(Supply pressure: at P = 0.5 MPa)



**Dimensions**

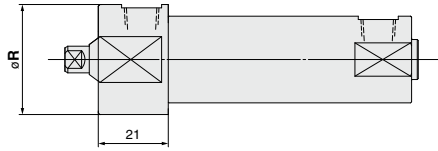
HY□B20 to 100



CJ5  
CG5

HY□

Water  
Resistant



ø20, 25

(mm)

Bore size (mm)	A	B	C	D	E1	E2	F1	F2	GA		GB	H	I	J
									Port: M5, Rc, NPT	Port: G				
20	M4 x 0.7 depth 8	14	18.5	8	15	12	3	2	13		10	10	26	M4 x 0.7 depth 7
25	M5 x 0.8 depth 10	16.5	18.5	10	17	14	3	2	13		10	10	31	M5 x 0.8 depth 7.5
32	M6 x 1.0 depth 12	20	20	12	19	18	3	2	12	11	10	10	38	M5 x 0.8 depth 8
40	M8 x 1.25 depth 13	26	26	16	23	25	3	2	13	10	10	15	47	M6 x 1.0 depth 12
50	M10 x 1.5 depth 15	32	32	20	28	30	3	2	14	14	12	15	58	M8 x 1.25 depth 16
63	M10 x 1.5 depth 15	38	38	20	28	32	3	2	14	12	12	15	72	M10 x 1.5 depth 16
80	M16 x 2.0 depth 21	50	50	25	33	40	3	3	20	17	16	20	89	M10 x 1.5 depth 22
100	M20 x 2.5 depth 27	60	60	30	38	50	3	3	20	17	16	20	110	M12 x 1.75 depth 22

Bore size (mm)	K	KA	NA	NB	P			R	S	ZZ
					Nii	TF	TN			
20	5	6	30	24	M5 x 0.8	—	—	33	69	81
25	5	8	30	29	M5 x 0.8	—	—	33	69	81
32	6	10	35.5	35.5	Rc 1/8	G 1/8	NPT 1/8	—	71	83
40	6.5	13	44	44	Rc 1/8	G 1/8	NPT 1/8	—	78	95
50	8	16	55	55	Rc 1/4	G 1/4	NPT 1/4	—	90	107
63	8	16	69	69	Rc 1/4	G 1/4	NPT 1/4	—	90	107
80	9.5	22	80	80	Rc 3/8	G 3/8	NPT 3/8	—	108	131
100	11.5	27	100	100	Rc 1/2	G 1/2	NPT 1/2	—	108	131

D-□

-X□

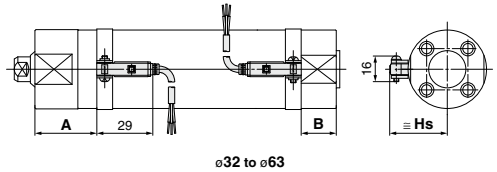
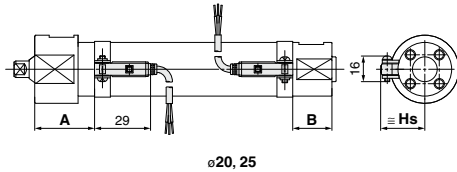
Technical  
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# Auto Switch Mounting 1

## Auto Switch Proper Mounting Position (Detection at stroke end) and Its Mounting Height

### HYB

#### D-H7BA

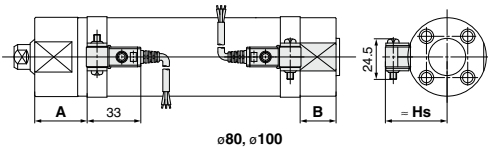


CJ5  
CG5

HY□

Water  
Resistant

#### D-G5BA



Bore size	D-H7BA			D-G5BA		
	A	B	Hs	A	B	Hs
20	29	19.5	24.5	—	—	—
25	29	19.5	27	—	—	—
32	30	20.5	30.5	—	—	—
40	34.5	22.5	35	—	—	—
50	42	27.5	40.5	—	—	—
63	42	27.5	47.5	—	—	—
80	—	—	—	48	32	59
100	—	—	—	48	32	69.5

Note) The above values are a guide in the stroke end detection of the mounting position of the auto switch. Please adjust in an actual setting after confirming the operating state of the auto switch.

## Operating Range

Auto switch model	Bore size							
	20	25	32	40	50	63	80	100
D-H7BA	4	4	4.5	5	6	6.5	—	—
D-G5BA	—	—	—	—	—	—	6.5	7

\* Since this is a guideline including hysteresis, it is not meant to be guaranteed. There may be substantial variation depending on the surrounding environment (assuming approximately ±30% dispersion).

## Minimum Stroke of Auto Switch Mounting

Auto switch model	1 pc.	2 pcs.
D-H7BA	10	15
D-G5BA	10	15

## Auto Switch Mounting Bracket/Part No.

Auto switch model	Bore size (mm)							
	20	25	32	40	50	63	80	100
D-H7BA	BMA2-020AS	BMA2-025AS	BMA2-032AS	BMA2-040AS	BMA2-050AS	BMA2-063AS	—	—
D-G5BA	—	—	—	—	—	—	BA-08 (+)	BA-10 (+)

\* When the auto switch bracket above is ordered as a single unit, steel screws are included. When assembling, use the stainless steel screws attached to the auto switches shown below.  
Stainless steel mounting screw kit

BBA3: for D-G5BA

• The D-G5BA auto switch is set on the cylinder with the stainless steel screws above when shipped. When an auto switch is shipped independently, BBA3 is attached.

Note 1) Refer to pages 1681 and 1682 for the details of BBA3.

Note 2) The stainless steel screws supplied with the D-H7BA auto switch cannot be used for the D-G5BA.

• Refer to pages 1681 and 1682 for auto switch mounting.

D-□

-X□

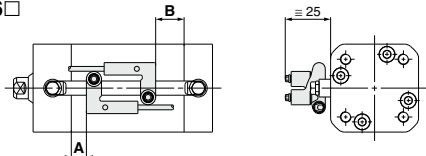
Technical  
Data

# Auto Switch Mounting 2

## Auto Switch Proper Mounting Position (Detection at stroke end) and Its Mounting Height

### HYQ series

D-F6□

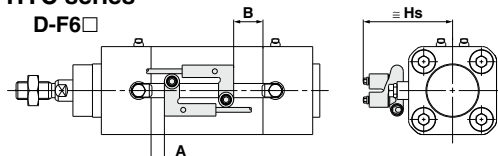


Bore size	(mm)	
	A	B
20	6.5	10.5
25	6.5	11
32	8.5	16
40	10.5	16
50	10.5	17
63	9	18

Note) The above values are a guide in the stroke end detection of the mounting position of the auto switch. Please adjust in an actual setting after confirming the operating state of the auto switch.

### HYC series

D-F6□

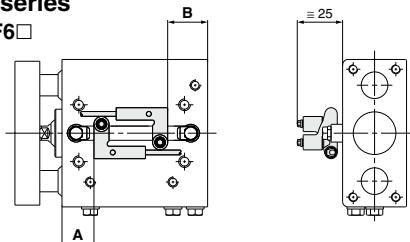


Bore size	(mm)		
	A	B	Hs
32	7.5	16.5	50
40	12	23	54
50	9	19	60
63	19	24	67

Note) The above values are a guide in the stroke end detection of the mounting position of the auto switch. Please adjust in an actual setting after confirming the operating state of the auto switch.

### HYG series

D-F6□



Bore size	A	(mm)			
		B			
		30 st or less	31 to 50 st	51 to 100 st	Over 101 st
20	16	22.5	32.5	52.5	72.5
25	17	25.5	35.5	55.5	75.5
32	22.5	36.5	46.5	61.5	76.5
40	21	38	48	63	78
50	21	45	55	70	85
63	23.5	42.5	52.5	67.5	82.5

Note) The above values are a guide in the stroke end detection of the mounting position of the auto switch. Please adjust in an actual setting after confirming the operating state of the auto switch.

## Operating Range

Unit: Operating range [mm]

Auto switch model	Series	Bore size					
		20	25	32	40	50	63
D-F6□	HYQ	7	6	7.5	7.5	7.5	7.5
	HYC	—	—	7.5	7.5	7.5	7.5
	HYG	7	7	8	7.5	7.5	7.5

Note) Since this is a guideline including hysteresis, it is not meant to be guaranteed. There may be substantial variation depending on the surrounding environment (assuming approximately ±30% dispersion).

## Minimum Stroke of Auto Switch Mounting

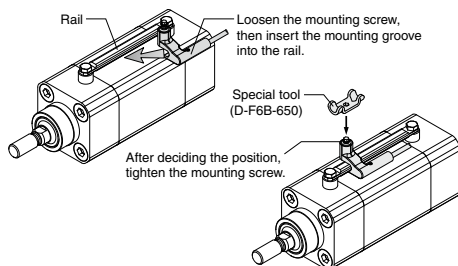
Auto switch model	Series	1 pc.	2 pcs.
		D-F6□	HYQ, HYC
	HYG	10	15

## Auto Switch Mounting (HYQ, HYC, HYG common)

### Proper tightening torque

When the mounting screw is tightened, use a special tool (D-F6B-650) or torque wrench.

The tightening torque of the M3 mounting screw should be 0.8 to 1.4 N·m.



Tighten the screw within the following torque range when the auto switch mounting rail is installed during maintenance.

Screw size	Tightening torque (N·m)
M4	1.1 to 1.9

Tighten the screw within the following torque range when the auto switch is installed on the mounting rail.

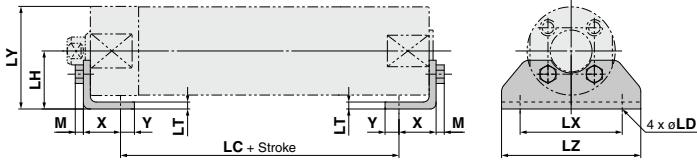
Tightening torque (N·m)
0.8 to 1.4

# HY□ Series

# Mounting Brackets

## Foot Bracket

### HYB series

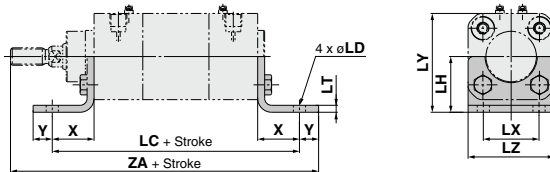


Foot bracket material: Stainless steel  
Mounting bolt material: Stainless steel (mm)

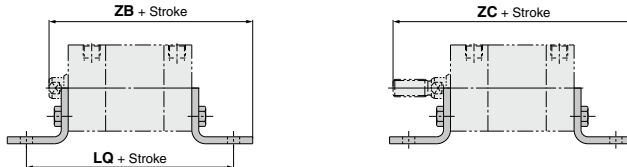
Bore size	Bracket part no.	Weight (kg)	X	Y	LD	LH	LC	LT	LX	LY	LZ	M	Mounting bolt
32	CG-L032SUS	0.06	16	6	7.2	25	45	3	44	44	60	3.5	M5 x 0.8
40	CG-L040SUS	0.08	16.5	6.5	7.2	30	51	3	54	53.5	75	4	M6 x 1.0
50	CG-L050SUS	0.17	21.5	11.5	10	40	55	4	66	69	90	5.5	M8 x 1.25
63	CG-L063SUS	0.23	21.5	11.5	12	45	55	4	82	81	110	7	M10 x 1.5
80	CG-L080SUS	0.36	28	17	12	55	60	4	100	99.5	130	7	M10 x 1.5
100	CG-L100SUS	0.69	30	15	14	70	60	6	120	125	160	8	M12 x 1.75

Note 1) Order two foot brackets per cylinder. One mounting bracket is attached with two foot brackets and four mounting bolts.  
Note 2) Contact SMC for HYB ø20, ø25.

### HYC series



### HYQ series



Foot bracket material: Stainless steel  
Mounting bolt material: Stainless steel (mm)

Bore size	Bracket part no.	Weight (g)	X	Y	LD	LH	LC	LT	LX	LY	LZ	HYC	HYQ			HYDQ			Mounting bolt
													ZA	LQ	ZB	ZC	LQ	ZB	
32	HY-L032SUS	100	24	11	7	32	142	4	32	57	49.5	177	109	107	129	124	122	144	M6 x 1 x 18L
40	HY-L040SUS	120	28	10	9	36	161	4	36	65	57.5	198	121.5	115.5	139.5	136.5	130.5	154.5	M6 x 1 x 18L
50	HY-L050SUS	210	32	11	9	45	170	5	45	80	69	218	140.5	133.5	165.5	155.5	148.5	180.5	M8 x 1.25 x 20L
63	HY-L063SUS	260	32	11	9	50	185	5	50	92	84	233	141	134	166	156	149	181	M8 x 1.25 x 20L

Note 1) One mounting bracket is attached with one foot bracket and two mounting bolts.  
Note 2) Two foot brackets per cylinder should be ordered.  
Note 3) Contact SMC for HYQ ø20, ø25.

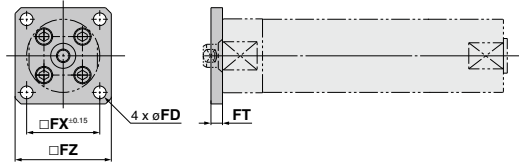
CJ5  
CG5  
HY□  
Water Resistant

D-□  
-X□  
Technical Data

## Flange Bracket

### HYB series (Rod end)

Rod end flange bracket (Material: Stainless steel)

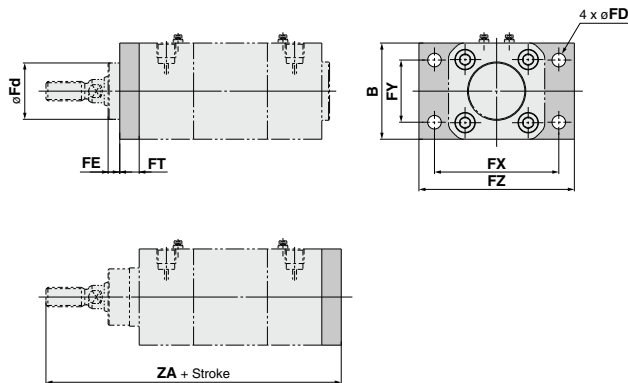


Flange bracket material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Bore size	Bracket part no.	Weight (kg)	FT	FX	FZ	FD
32	CG-F032SUS	0.10	6	38	50	6.6
40	CG-F040SUS	0.15	6	46	60	6.6
50	CG-F050SUS	0.26	9	58	75	9
63	CG-F063SUS	0.52	9	70	90	11
80	CG-F080SUS	0.66	9	82	100	11
100	CG-F100SUS	1.16	10	100	125	14

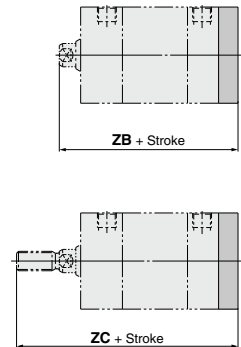
Note 1) One mounting bracket is attached with one flange bracket and four mounting bolts.  
Note 2) Contact SMC for HYB ø20, ø25.

### HYC series (Rod end and head end are common.)



### HYQ series

(Rod end and head end are common.)



Flange bracket material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Bore size	Bracket part no.	Weight (g)	B	FD	FE	FT	FX	FY	FZ	Fd	HYC	HYQ		HYDQ		Mounting bolt
												Without auto switch	With auto switch	Without auto switch	With auto switch	
32	HY-F032SUS	260	49.5	7	6	10	64	32	80	29	152	82	104	97	119	M6 x 1 x 18L
40	HY-F040SUS	320	57.5	9	8.5	10	72	36	90	34	169	87.5	111.5	102.5	126.5	M6 x 1 x 18L
50	HY-F050SUS	580	69	9	11	12	90	45	110	39	187	102.5	134.5	117.5	149.5	M8 x 1.25 x 20L
63	HY-F063SUS	770	82	9	11	12	100	50	120	44	202	103	135	118	150	M8 x 1.25 x 20L

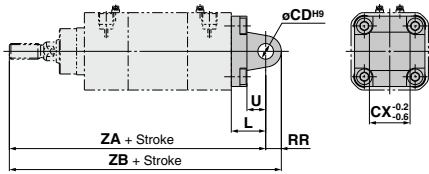
Note 1) One mounting bracket is attached with 4 mounting bolts.  
Note 2) Contact SMC for HYQ ø20, ø25.



## Single Clevis Bracket

### HYC series

Single clevis bracket material: Stainless steel  
Mounting bolt material: Stainless steel (mm)



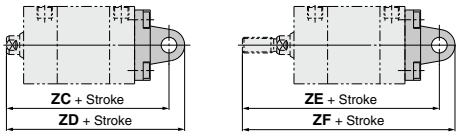
Bore size	Bracket part no.	Weight (g)	L	RR	U	CDH9	HYC		
							CX <sup>-0.2/-0.6</sup>	ZB	ZA
32	HY-C032SUS	200	22	10	12	10	26	164	174
40	HY-C040SUS	310	25	12	15	12	28	184	196
50	HY-C050SUS	440	27	12	17	12	32	202	214
63	HY-C063SUS	760	32	16	20	16	40	222	238

CJ5  
CG5

**HY**

Water  
Resistant

### HYQ series



Bore size	Bracket part no.	HYQ / without auto switch			
		ZC	ZD	ZE	ZF
32	HY-C032SUS	94	104	116	126
40	HY-C040SUS	102.5	114.5	126.5	138.5
50	HY-C050SUS	117.5	129.5	149.5	161.5
63	HY-C063SUS	123	139	155	171

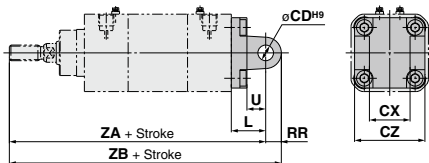
Bore size	Bracket part no.	HYDQ / with auto switch				Mounting bolt
		ZC	ZD	ZE	ZF	
32	HY-C032SUS	109	119	131	141	M6 x 1 x 18L
40	HY-C040SUS	117.5	129.5	141.5	153.5	M6 x 1 x 18L
50	HY-C050SUS	132.5	144.5	164.5	176.5	M8 x 1.25 x 20L
63	HY-C063SUS	138	154	170	186	M8 x 1.25 x 20L

Note 1) One mounting bracket is attached with 4 mounting bolts.  
Note 2) Contact SMC for HYQ ø20, ø25.

## Double Clevis Bracket

### HYC series

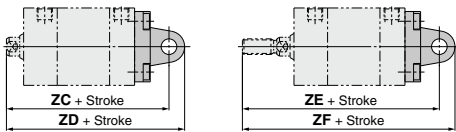
Double clevis bracket material: Stainless steel  
Mounting bolt material: Stainless steel (mm)



Bore size	Bracket part no.	Weight (g)	L	RR	U	CDH9	CX <sup>H14</sup>	CZ <sup>H14</sup>
40	HY-D040SUS	350	25	12	15	12	28	52
50	HY-D050SUS	490	27	12	17	12	32	60
63	HY-D063SUS	810	32	16	20	16	40	70

Bore size	Bracket part no.	HYC		HYQ / without auto switch			
		ZA	ZB	ZC	ZD	ZE	ZF
32	HY-D032SUS	164	174	94	104	116	126
40	HY-D040SUS	184	196	102.5	114.5	126.5	138.5
50	HY-D050SUS	202	214	117.5	129.5	149.5	161.5
63	HY-D063SUS	222	238	123	139	155	171

### HYQ series

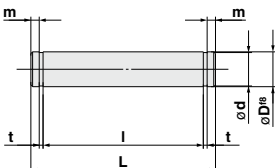


Bore size	Bracket part no.	HYDQ / with auto switch				Mounting bolt
		ZC	ZD	ZE	ZF	
32	HY-D032SUS	109	119	131	141	M6 x 1 x 18L
40	HY-D040SUS	117.5	129.5	141.5	153.5	M6 x 1 x 18L
50	HY-D050SUS	132.5	144.5	164.5	176.5	M8 x 1.25 x 20L
63	HY-D063SUS	138	154	170	186	M8 x 1.25 x 20L

Note 1) One mounting bracket is attached with 4 mounting bolts and clevis pin (HY-E0□SUS) and retaining rings.  
Note 2) Contact SMC for HYQ ø20, ø25.

## Clevis Pin

Pin material: Stainless steel  
Retaining ring material: Stainless steel (mm)



Bore size	Bracket part no.	Weight (g)	D <sup>ø</sup>	L	d	l	m	t	Applied retaining ring
40	HY-E04SUS	60	12	60	11.5	53	2.3	1.2	C type for shaft 12
50	HY-E05SUS	70	12	68	11.5	61	2.3	1.2	C type for shaft 12
63	HY-E06SUS	130	16	78	15.2	71	2.3	1.2	C type for shaft 16

Note 1) One clevis pin is attached with two retaining rings.  
Note 2) Contact SMC for HYQ ø20, ø25.

D-

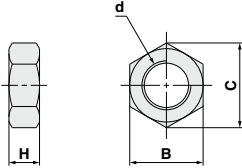
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Technical  
Data

# HY□ Series Options

## Rod End Nut

### HYQ, HYC series



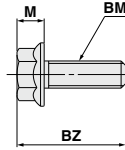
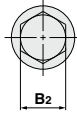
Material: Stainless steel  
(mm)

Part no.	Applicable bore size	d	H	B	C
NTH-02SUS	20	M6 x 1.0	3.6	10	11.5
NT-02SUS	25	M8 x 1.25	5	13	15
NT-03SUS	32	M10 x 1.25	6	17	19.6
NTH-04SUS	40	M12 x 1.25	7	19	21.9
NTH-05SUS	50, 63	M16 x 1.5	10	24	27.7

## Plug Bolt

Plug bolts are used to close the mounting hole not used.

### HYC series

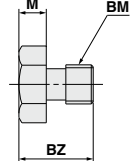
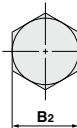


Material: Stainless steel  
(mm)

Part no.	Applicable bore size	B2	BM	BZ	M
HYC-H03SUS	32, 40	10	M6 x 1.0	22	6
HYC-H05SUS	50, 63	12	M8 x 1.25	24	8

Note) The above part number is attached with 4 bolts.

### HYB, HYG series



Material: Stainless steel  
(mm)

#### HYB

Part no.	Applicable bore size	B2	BM	BZ	M
HYB-H020SUS	20	7	M4 x 0.7	9	3
HYB-H025SUS	25	8	M5 x 0.8	9.5	3.5
HYB-H025SUS	32	8	M5 x 0.8	9.5	3.5
HYB-H040SUS	40	10	M6 x 1.0	12	4
HYB-H050SUS	50	13	M8 x 1.25	15.5	5.5
HYB-H063SUS	63	17	M10 x 1.5	19	7
HYB-H063SUS	80	17	M10 x 1.5	19	7
HYB-H100SUS	100	19	M12 x 1.75	24	8

Note) The above part number is attached with 4 bolts.

#### HYG

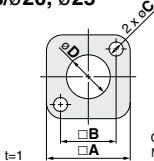
Part no.	B2	BM	BZ	M
HYG-H020SUS	8	M5 x 0.8	9.5	3.5
HYG-H025SUS	10	M6 x 1.0	12	4
HYG-H032SUS	13	M8 x 1.25	15.5	5.5
HYG-H050SUS	17	M10 x 1.5	19	7

Note) The above part number is attached with 4 bolts.

## External Cover

### HYQ series/ø20, ø25

#### Rod end

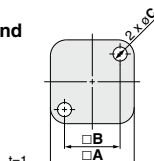


Cover material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Part no.	A	B	C	D	Installation bolt
HYQ-HA020SUS	32.2	22	5.5	18.5	M5 x 0.8 x 10L
HYQ-HA025SUS	39.2	26	6.6	20.5	M6 x 1.0 x 10L

Note) One mounting bracket is attached with two mounting bolts.

#### Head end



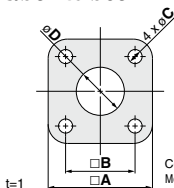
Cover material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Part no.	A	B	C	Installation bolt
HYQ-HB020SUS	32.2	22	5.5	M5 x 0.8 x 10L
HYQ-HB025SUS	39.2	26	6.6	M6 x 1.0 x 10L

Note) One mounting bracket is attached with two mounting bolts.

### HYQ series/ø32 to ø63

#### Rod end

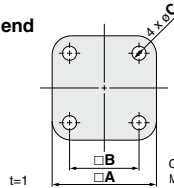


Cover material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Part no.	A	B	C	D	Installation bolt
HYQ-HA032SUS	48.8	32.5	6.6	22.5	M6 x 1.0 x 10L
HYQ-HA040SUS	56.8	38	6.6	26.5	M6 x 1.0 x 10L
HYQ-HA050SUS	68.2	46.5	8.8	32.5	M8 x 1.25 x 10L
HYQ-HA063SUS	83.2	56.5	8.8	32.5	M8 x 1.25 x 10L

Note) One mounting bracket is attached with four mounting bolts.

#### Head end



Cover material: Stainless steel  
Mounting bolt material: Stainless steel  
(mm)

Part no.	A	B	C	Installation bolt
HYQ-HB032SUS	48.8	32.5	6.6	M6 x 1.0 x 10L
HYQ-HB040SUS	56.8	38	6.6	M6 x 1.0 x 10L
HYQ-HB050SUS	68.2	46.5	8.8	M8 x 1.25 x 10L
HYQ-HB063SUS	83.2	56.5	8.8	M8 x 1.25 x 10L

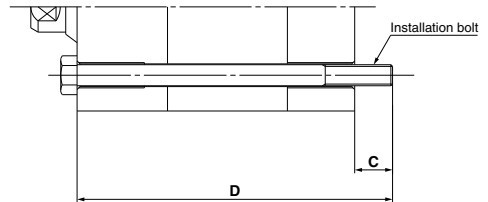
Note) One mounting bracket is attached with four mounting bolts.

**Mounting Bolts for HYQB and HYDQB**

**Mounting method** : Mounting bolts for HYQB and HYDQB with through-holes are available.

**How to Order** : Add "HY-" to the head of the bolt.

**Example)** Prepare the mounting bolt of cylinder model "HYQB20-5".  
The part no. is "HY-M4 x 65L" 2 pcs.



**CJ5**  
**CG5**  
**HY**   
Water Resistant

**HYQ/Without built-in magnet**

Cylinder model	C	D	Mounting bolt part no.
<b>HYQB20-5</b>	10	65	HY-M4 x 65L
-10		70	x 70L
-15		75	x 75L
-20		80	x 80L
-25		85	x 85L
-30		90	x 90L
-35		95	x 95L
-40		100	x 100L
-45		105	x 105L
-50		110	x 110L
<b>HYQB25-5</b>	9	65	HY-M5 x 65L
-10		70	x 70L
-15		75	x 75L
-20		80	x 80L
-25		85	x 85L
-30		90	x 90L
-35		95	x 95L
-40		100	x 100L
-45		105	x 105L
-50		110	x 110L

Cylinder model	C	D	Mounting bolt part no.
<b>HYQB32-5</b>	9	75	HY-M5 x 75L
-10		80	x 80L
-15		85	x 85L
-20		90	x 90L
-25		95	x 95L
-30		100	x 100L
-35		105	x 105L
-40		110	x 110L
-45		115	x 115L
-50		120	x 120L
-75	145	x 145L	
-100	170	x 170L	
<b>HYQB40-5</b>	9.5	80	HY-M5 x 80L
-10		85	x 85L
-15		90	x 90L
-20		95	x 95L
-25		100	x 100L
-30		105	x 105L
-35		110	x 110L
-40		115	x 115L
-45		120	x 120L
-50		125	x 125L
-75	150	x 150L	
-100	175	x 175L	

Cylinder model	C	D	Mounting bolt part no.
<b>HYQB50-10</b>	13.5	100	HY-M6 x 100L
-15		105	x 105L
-20		110	x 110L
-25		115	x 115L
-30		120	x 120L
-35		125	x 125L
-40		130	x 130L
-45		135	x 135L
-50		140	x 140L
-75		165	x 165L
-100	190	x 190L	
<b>HYQB63-10</b>	13	100	HY-M6 x 100L
-15		105	x 105L
-20		110	x 110L
-25		115	x 115L
-30		120	x 120L
-35		125	x 125L
-40		130	x 130L
-45		135	x 135L
-50		140	x 140L
-75		165	x 165L
-100	190	x 190L	

Material: Stainless steel

**HYDQ/With built-in magnet**

Cylinder model	C	D	Mounting bolt part no.
<b>HYDQB20-5</b>	10	75	HY-M4 x 75L
-10		80	x 80L
-15		85	x 85L
-20		90	x 90L
-25		95	x 95L
-30		100	x 100L
-35		105	x 105L
-40		110	x 110L
-45		115	x 115L
-50		120	x 120L
<b>HYDQB25-5</b>	9	75	HY-M5 x 75L
-10		80	x 80L
-15		85	x 85L
-20		90	x 90L
-25		95	x 95L
-30		100	x 100L
-35		105	x 105L
-40		110	x 110L
-45		115	x 115L
-50		120	x 120L

Cylinder model	C	D	Mounting bolt part no.
<b>HYDQB32-5</b>	9	90	HY-M5 x 90L
-10		95	x 95L
-15		100	x 100L
-20		105	x 105L
-25		110	x 110L
-30		115	x 115L
-35		120	x 120L
-40		125	x 125L
-45		130	x 130L
-50		135	x 135L
-75	160	x 160L	
-100	185	x 185L	
<b>HYDQB40-5</b>	9.5	95	HY-M5 x 95L
-10		100	x 100L
-15		105	x 105L
-20		110	x 110L
-25		115	x 115L
-30		120	x 120L
-35		125	x 125L
-40		130	x 130L
-45		135	x 135L
-50		140	x 140L
-75	165	x 165L	
-100	190	x 190L	

Cylinder model	C	D	Mounting bolt part no.
<b>HYDQB50-10</b>	13.5	115	HY-M6 x 115L
-15		120	x 120L
-20		125	x 125L
-25		130	x 130L
-30		135	x 135L
-35		140	x 140L
-40		145	x 145L
-45		150	x 150L
-50		155	x 155L
-75		180	x 180L
-100	205	x 205L	
<b>HYDQB63-10</b>	13	115	HY-M6 x 115L
-15		120	x 120L
-20		125	x 125L
-25		130	x 130L
-30		135	x 135L
-35		140	x 140L
-40		145	x 145L
-45		150	x 150L
-50		155	x 155L
-75		180	x 180L
-100	205	x 205L	

**D**   
**X**   
Technical Data