



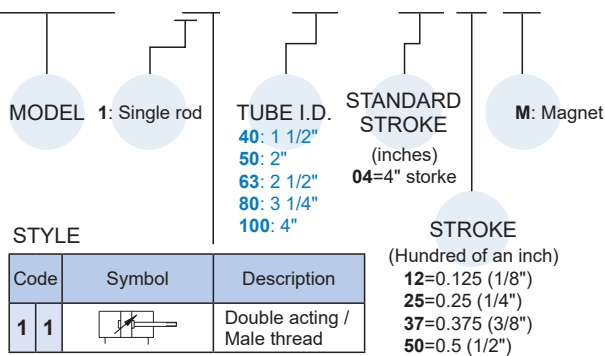
Table for standard stroke

Tube I.D.	Stroke (inch)	Max. stroke (inch)
40: 1 1/2"	1, 2, 3, 4, 5, 6, 8, 10, 12, 14, 16, 18, 20	70
50: 2"	1, 2, 3, 4, 5, 6, 8, 10, 12, 14, 16, 18, 20, 24	80
63: 2 1/2"	1, 2, 3, 4, 5, 6, 8, 10, 12, 14, 16, 18, 20, 24	100
80: 3 1/4"	1, 2, 3, 4, 5, 6, 8, 10, 12, 14, 16, 18, 20, 24	
100: 4"	1, 2, 3, 4, 5, 6, 8, 10, 12, 14, 16, 18, 20, 24	

* Intermediate stroke are available, please contact us.

Order example

MCQN – 11 – 40 – 0425M



* Order example for special specification, refer to page 0-7.

Features

■ Non lubrication

Special housing and bushing enables self lubrication of piston rod.

■ High quality long service life

Hard anodised aluminium cylinder tubes offer a high resistance to corrosion and low internal friction.

■ Full range of NFPA interchangeable mounting configurations

Mounting dimensions are in accordance with ANSI (NFPA) T3.6.7 R2-1996, fluid power systems and products-square head industrial cylinders-mounting dimensions.

Specification

Model	MCQN				
Tube I.D. (inch)	1 1/2"	2"	2 1/2"	3 1/4"	4"
Port size	NPT3/8			NPT1/2	
Medium	Air				
Operating pressure range	0.05~1 MPa				
Proof pressure	1.5 MPa				
Ambient temperature	-5~+60°C (No freezing)				
Available speed range	50~500 mm/sec				
Sensor switch	RCA (Please refer to page 8-8)				
Sensor switch holder	HV1	HV2	HV2	HV3	HV3

Accessories & Connector

Accessories Δ TC accessories are factory assembled and shipped (self-assembled is not recommended)

Code	LB (Purchase 2 pcs)	CA	CB	CB2	FAC	FBC	TC Δ
Mounting Tube I.D.							
$\phi 40$	LB-Q5-40	CA-Q5-40	CB-Q5-40	CB2-Q5-40	FAC-Q5-40		TC-Q5-40
$\phi 50$	LB-Q5-50	CA-Q5-50	CB-Q5-50	CB2-Q5-50	FAC-Q5-50		TC-Q5-50
$\phi 63$	LB-Q5-63	CA-Q5-63	CB-Q5-63	CB2-Q5-63	FAC-Q5-63		TC-Q5-63
$\phi 80$	LB-Q5-80	CA-Q5-80	CB-Q5-80	CB2-Q5-80	FAC-Q5-80		TC-Q5-80
$\phi 100$	LB-Q5-100	CA-Q5-100	CB-Q5-100	CB2-Q5-100	FAC-Q5-100		TC-Q5-100

Pin

Connector		Applicable CA/ CB/ CB2/ Y/ I	
Code	Y	I	PIN (with split pin)
Mounting Tube I.D.			Fig
$\phi 40$	Y-Q5-40	I-Q5-40	$\phi 40$
$\phi 50$			PIN-Q5-40-1-P
$\phi 63$			
$\phi 80$	Y-Q5-80	I-Q5-80	$\phi 80$
$\phi 100$			PIN-Q5-80-1-P

Order example of self-assembled

The tube I.D. $\phi 63$ of LB accessories, Y connector and pin.

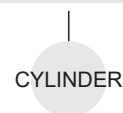
No.	Order number	Qty
1	LB-Q5-63	2
2	Y-Q5-40	1
3	PIN-Q5-40-1-P	1

* To order accessories/ connectors/ pin separately, please place orders separately according to the order codes in the above table.

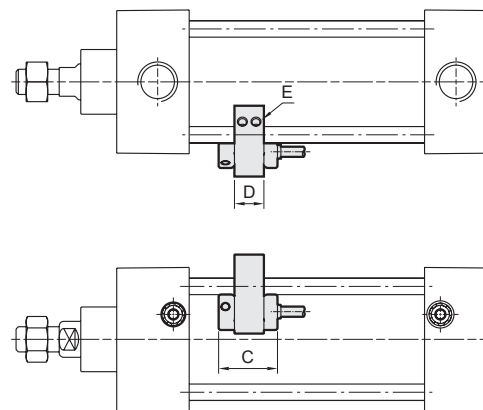
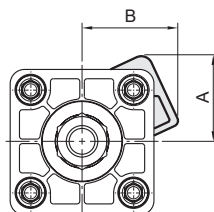
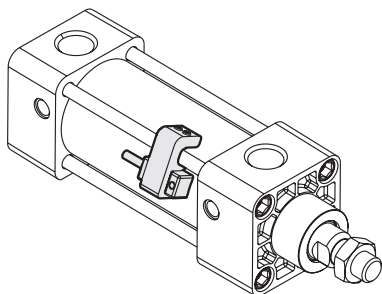
Order example of factory assembled

Δ Cylinders and accessories are distinguished by the symbol " + ".

MCQN – Standard model no. + TC



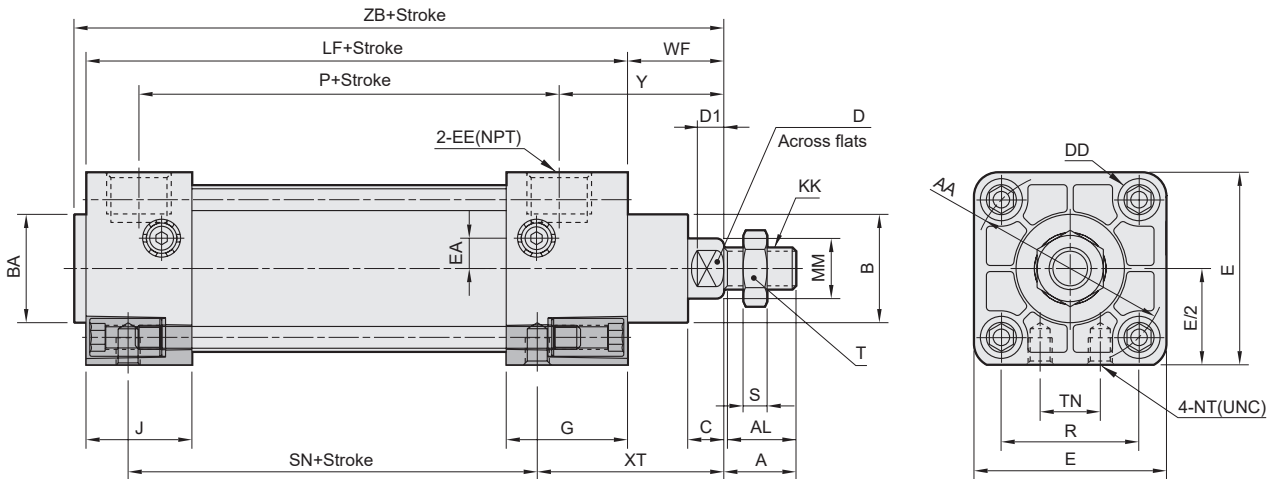
Installation of sensor switch



Unit: inch

Code Tube I.D.	Sensor switch	Hold	A	B	C	D	E
40	RCA	HV1	1.10	1.47	1.02	0.51	M4×10L
50	RCA	HV2	1.49	1.68	1.02	0.51	M4×10L
63	RCA	HV2	1.66	1.86	1.02	0.51	M4×10L
80	RCA	HV3	1.87	2.13	1.02	0.51	M4×10L
100	RCA	HV3	2.15	2.42	1.02	0.51	M4×10L

11



Unit: inch




Code Tube I.D.	A	AA	AL	B	BA	C	D	D1	DD	E	EA	EE	G	J	KK	LF	MM	NT	P	R
40	0.75	2.02	0.673	1.125	1.125	0.375	0.56	0.3	1/4-28	2	0.32	3/8	1.26	1.10	7/16-20	3.625	0.625	1/4-20×0.28 dp	2.36	1.43
50	0.75	2.60	0.673	1.125	1.125	0.375	0.56	0.3	5/16-24	2.5	0.43	3/8	1.26	1.06	7/16-20	3.625	0.625	5/16-18×0.44 dp	2.40	1.84
63	0.75	3.10	0.673	1.125	1.125	0.375	0.56	0.3	5/16-24	3	0.47	3/8	1.30	1.06	7/16-20	3.75	0.625	3/8-16×0.59 dp	2.48	2.19
80	1.125	3.90	1.045	1.5	1.5	0.5	0.88	0.4	3/8-24	3.75	—	1/2	1.57	1.18	3/4-16	4.25	1	1/2-13×0.63 dp	2.72	2.76
100	1.125	4.70	1.045	1.5	1.5	0.5	0.88	0.4	3/8-24	4.5	—	1/2	1.57	1.18	3/4-16	4.25	1	1/2-13×0.63 dp	2.72	3.32

Code Tube I.D.	S	SN	T	TN	WF	XT	Y	ZB
40	0.26	2.25	0.69	0.63	1	1.94	1.71	4.75
50	0.26	2.25	0.69	0.88	1	1.94	1.71	4.75
63	0.26	2.38	0.69	1.25	1	1.94	1.75	4.88
80	0.42	2.63	1.12	1.50	1.38	2.44	2.34	5.83
100	0.42	2.63	1.12	2.06	1.38	2.44	2.34	5.83

STANDARD CYLINDER










Cylinder weight

Unit: kg

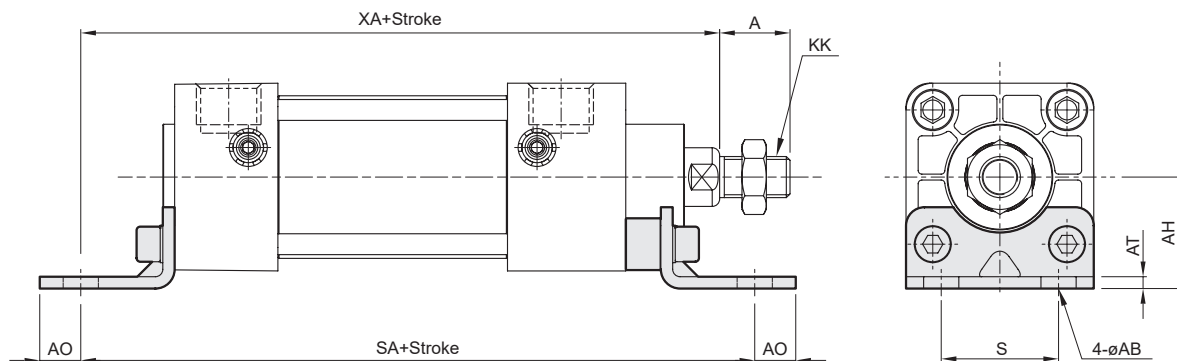
Model	Basic weight MCQN-11	Basic weight (magnet) MCQN-11	Stroke 1 inch MCQN-11
Tube I.D.			
40	0.664	0.676	0.078
50	0.965	0.981	0.096
63	1.314	1.334	0.108
80	2.482	2.510	0.200
100	3.266	3.300	0.220

Accessories weight

Unit: kg

Model	LB	CA	CB	CB2	FAC/FBC	TC	Y	I	PIN
Tube I.D.									
40	0.160	0.285	0.229	0.287	0.246	0.554	0.205	0.150	0.065
50	0.240	0.394	0.377	0.424	0.403	0.644	0.205	0.150	0.065
63	0.300	0.531	0.521	0.563	0.576	0.840	0.205	0.150	0.065
80	0.633	1.511	1.302	1.482	1.408	1.098	0.662	0.522	0.175
100	0.955	2.047	1.821	2.033	2.015	1.450	0.662	0.522	0.175

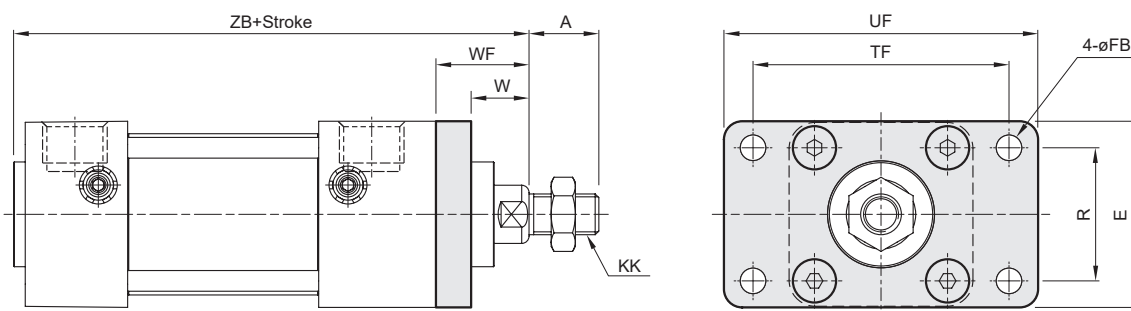
LB



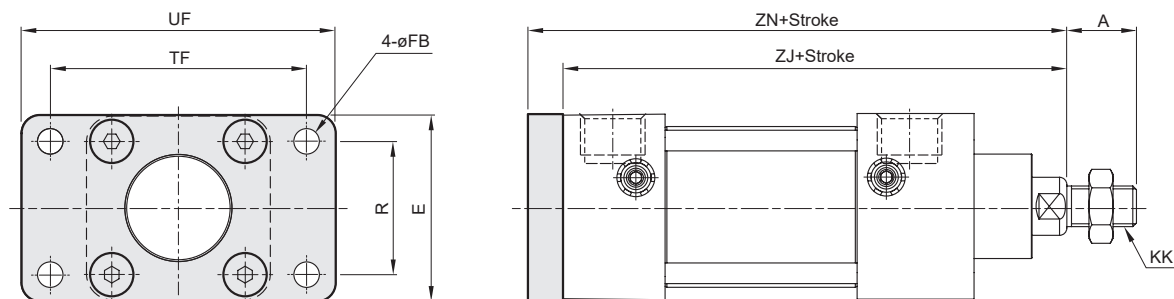
Unit: inch

Code Tube I.D.	A	AB	AH	AT	AO	KK	S	SA	XA
40	0.75	0.38	1.19	0.13	0.44	7/16-20	1.25	6	5.63
50	0.75	0.38	1.44	0.13	0.56	7/16-20	1.75	6	5.63
63	0.75	0.38	1.63	0.13	0.56	7/16-20	2.25	6.13	5.75
80	1.125	0.5	1.94	0.17	0.75	3/4-16	2.75	7.38	6.88
100	1.125	0.5	2.25	0.23	0.75	3/4-16	3.5	7.38	6.88

FAC



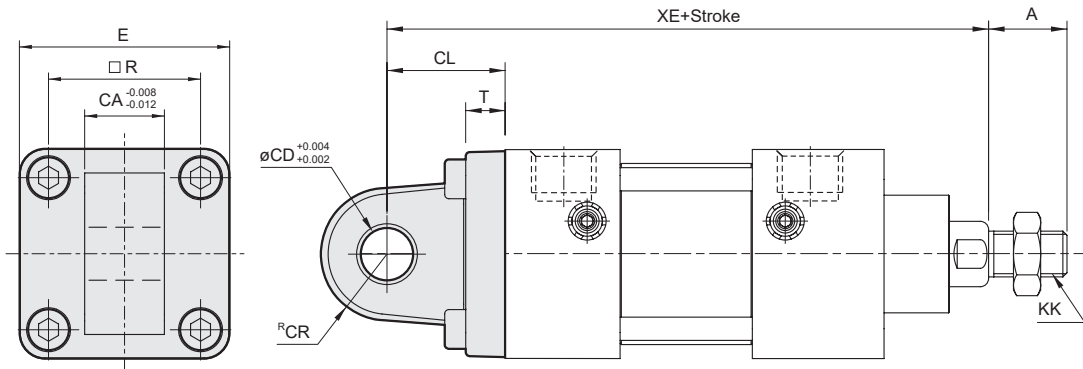
FBC



Unit: inch

Code Tube I.D.	A	E	FB	KK	R	TF	UF	W	WF	ZB	ZJ	ZN
40	0.75	2	0.25	7/16-20	1.43	2.75	3.38	0.63	1	4.75	4.63	5
50	0.75	2.5	0.31	7/16-20	1.84	3.38	4.13	0.63	1	4.75	4.63	5
63	0.75	3	0.31	7/16-20	2.19	3.88	4.63	0.63	1	4.88	4.75	5.13
80	1.125	3.75	0.38	3/4-16	2.76	4.68	5.50	0.75	1.38	5.83	5.63	6.25
100	1.125	4.5	0.38	3/4-16	3.32	5.44	6.25	0.75	1.38	5.83	5.63	6.25

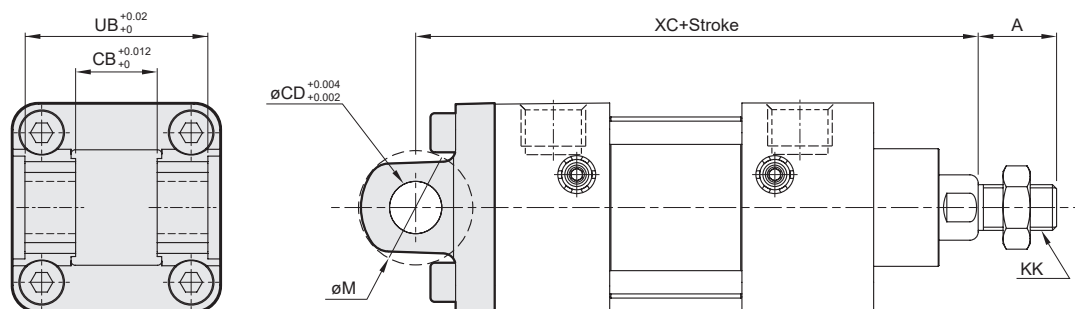
CA



Unit: inch

Code Tube I.D.	A	CA	CD	CL	CR	E	KK	R	T	XE
40	0.75	0.75	0.5	1.125	0.63	2	7/16-20	1.43	0.375	5.75
50	0.75	0.75	0.5	1.125	0.63	2.5	7/16-20	1.84	0.375	5.75
63	0.75	0.75	0.5	1.125	0.63	3	7/16-20	2.19	0.375	5.88
80	1.125	1.25	0.75	1.875	0.87	3.75	3/4-16	2.76	0.625	7.5
100	1.125	1.25	0.75	1.875	0.87	4.5	3/4-16	3.32	0.625	7.5

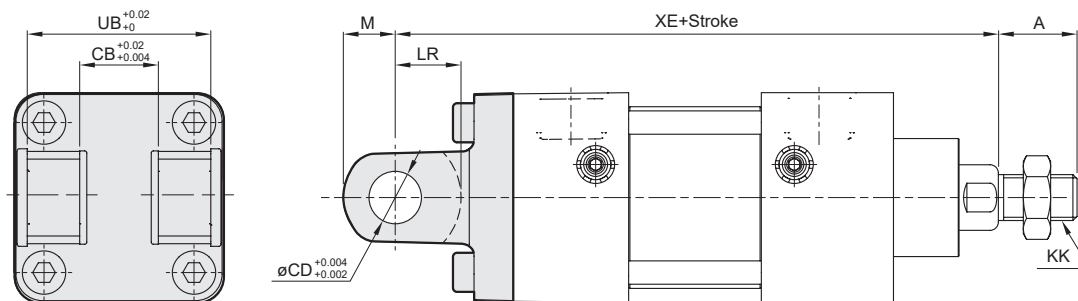
CB



Unit: inch

Code Tube I.D.	A	CB	CD	KK	M	UB	XC
40	0.75	0.78	0.5	7/16-20	1.24	1.75	5.38
50	0.75	0.78	0.5	7/16-20	1.24	1.75	5.38
63	0.75	0.78	0.5	7/16-20	1.24	1.75	5.5
80	1.125	1.28	0.75	3/4-16	1.88	2.5	6.88
100	1.125	1.28	0.75	3/4-16	1.88	2.5	6.88

CB2

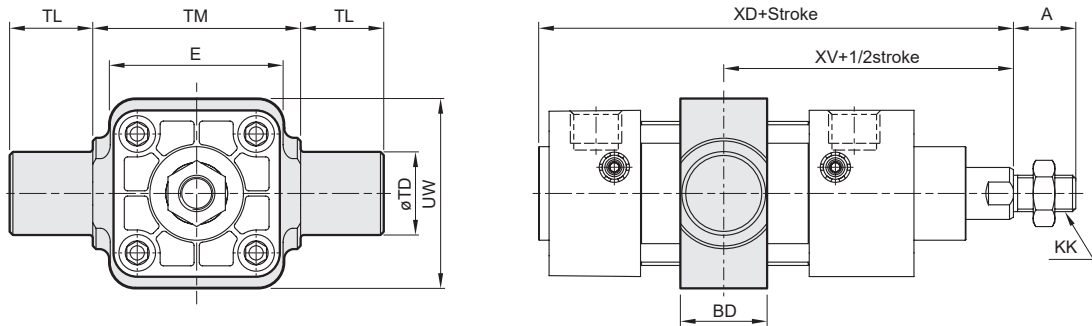


Unit: inch

Code Tube I.D.	A	CB	CD	KK	LR	M	UB	XE
40	0.75	0.75	0.5	7/16-20	0.63	0.5	1.75	5.75
50	0.75	0.75	0.5	7/16-20	0.63	0.5	1.75	5.75
63	0.75	0.75	0.5	7/16-20	0.63	0.5	1.75	5.88
80	1.125	1.25	0.75	3/4-16	1	0.75	2.5	7.5
100	1.125	1.25	0.75	3/4-16	1	0.75	2.5	7.5

STANDARD CYLINDER

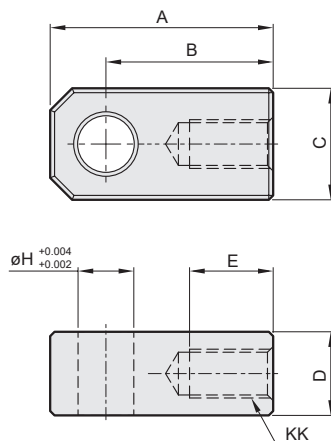
TC



Unit: inch

Code Tube I.D.	A	BD	E	KK	TD	TM	TL	UW	XD	XV
40	0.75	1.04	2.11	7/16-20	1	2.5	1	2.28	4.94	3.2
50	0.75	1.04	2.6	7/16-20	1	3	1	2.60	5.03	3.32
63	0.75	1.1	3.09	7/16-20	1	3.5	1	3.23	5.07	3.33
80	1.125	1.18	3.7	3/4-16	1	4.5	1	4.17	6.16	4.19
100	1.125	1.22	4.49	3/4-16	1	5.25	1	4.96	6.18	4.19

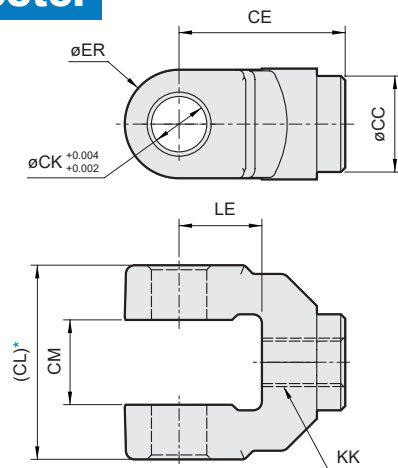
I connector



Unit: inch

Code Tube I.D.	A	B	C	D	E	H	KK
40~63	2	1.5	1	0.75	0.75	0.5	7/16-20
80~100	2.81	2.06	1.5	1.25	1.13	0.75	3/4-16

Y connector



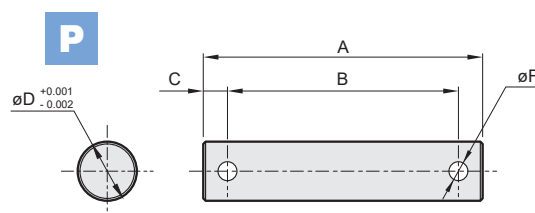
Unit: inch

Code Tube I.D.	CC	CE	CL	CM	CK	ER	KK	LE
40~63	0.87	1.5	1.75	0.765	0.5	1	7/16-20	0.75
80~100	1.34	2.38	2.5	1.265	0.75	1.5	3/4-16	1.25

* Please do not take the sand casting plate as the mounting plate, because we do not machine it. If you have this special demand, please contact our sales representative.

PIN

for CB & CB2 accessory and Y & I connector.



Unit: inch

Code Tube I.D.	A	B	C	D	F
40~63	2.36	1.95	0.2	0.5	0.16
80~100	3.13	2.74	0.19	0.75	0.2