

Fulcrum hand Double acting/single acting

HBL Series

● Open and close angle: -5□to 20□





Specifications

HR LN

HAP BSA2

LHAG LHAG HKP

HLA/ HLB HLAG/ HLBG HEP HCP HMF HMFB HFP HLC HGP

HBL HDL HMD HJL BHE CKG

CKA
CKS
CKF
CKJ

CKL2 -*-HC

CKH2
CKLB2
NCK/
SCK/FCK
FJ
FK
Ending

Descriptions		HBL			
Size		1C	2CS	3CS	4CS
Cylinder bore size	mm	<i>∲</i> 15	φ20	<i>\$</i> 25	<i>ϕ</i> 40
Actuation		Double acting/single acting			
Working fluid		Compressed air			
Max. working pressure	MPa	0.7			
Min. working pressure	MPa	0.3			
Ambient temperature	□C	5 to 60			
Port size			M5		Rc1/8
Open angle D	egree	-5 to 20			
Rod diameter	mm	<i>φ</i> 8	φ10	φ12	<i>ϕ</i> 14
Capacity of reciprocating	cm³	0.5	2.2	4.3	14.2
Repeatability	mm	±0.03			
Product weight	kg	0.09	0.22	0.39	0.82
Lubrication		Not required (when lubricating, use turbine oil Class 1 ISO VG32)			

Switch specifications

Descriptions	Proximity 2 wire	Proximity 3 wire	
Descriptions	T2H/T2V	T3H/T3V	
Applications	Programmable controller	Programmable controller, relay	
Output method	-	NPN output	
Power voltage	-	10 to 28 VDC	
Load voltage/current	10 to 30 VDC, 5 to 20 mA (Note 1)	30 VDC or less, 100mA or less	
Light	LED (ON lighting)		
Leakage current	1mA or less	10μA or less	
Maximum shock resistance	980m/s₂		
Lead wire	Standard 1m	Standard 1m	
	(oil resistant vinyl cabtire cable 2-conductor 0.2mm²)	(oil resistant vinyl cabtire cable 2-conductor 0.2mm²)	

Note 1: Max. load current above: 20 mA at 25 C.

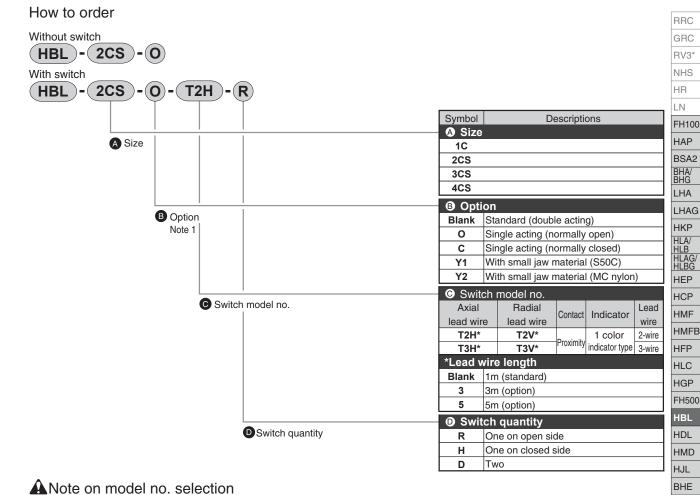
The current will be lower than 20mA if ambient temperature around switch is higher than 25 \Box C. (5 to 10mA with 60 \Box C)



CKD



How to order



Note 1: Refer to pages 412 to 413 for the dimensions and applicable model of the small jaw. When ordered as an option, two are included on delivery.

<Example of model number>

HBL-2CS-O-T2H-R

Model: Fulcrum hand

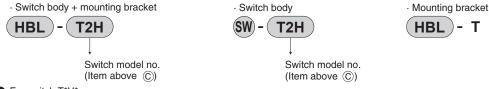
A Size : 2CS

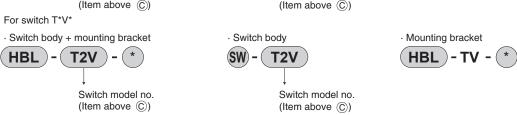
B Option : Single acting, normally open type Switch model no.: Proximity T2H switch, lead wire 1m

D Switch quantity : One on open side

How to order switch

For switch T*H*





(Select either R (open) or H (closed) for sections marked with an asterisk (*).)

CKD

383

CKG

CK CKA

CKS

CKF CKJ

CKL2 CKL2 -*-HC

CKH2

CKLB2 NCK/ SCK/FCk FJ

FK

Ending

Fulcrum hand Hand

