

HBC Hydraulic Block Cylinder

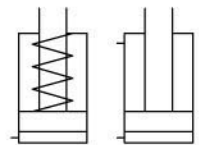
Piston: Ø16~Ø40 mm | Pressure Max: 500 bar

Applications

- HBC hydraulic block cylinders have a wide range of applications. They can be designed and used to achieve functions such as positioning, fixing, supporting, and pushing according to the user's needs.

Introduction

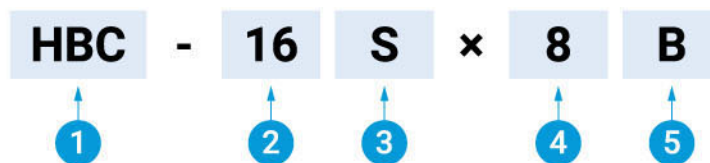
- This series is in accordance with German standards.
- The product includes a dust seal to prevent external oil contamination from entering the cylinder body.
- The maximum operating pressure can reach 500 bar.
- This product can be manufactured as pipe thread or manifold-mounted, and the inlet hole position on the manifold can be selected as needed.
- It can be made as single-acting (with spring return) or double-acting based on requirements.
- Most block cylinders have a filter at the inlet hole to effectively filter out large impurities and prevent them from entering the cylinder body, reducing internal wear and extending the product's lifespan. (Some small block cylinders cannot accommodate filters due to their small size.)



Precautions

- Avoid Lateral Forces: Applying excessive lateral forces on the piston rod can damage the cylinder's internal components, reducing its product lifespan, and potentially causing hydraulic fluid leakage or external leaks.

Part-No.



No.	Meaning	Option
1	Series	HBC
2	The Diameter of Piston	16 / 25 / 32 / 40
3	Single Action / Double Action	S / D
4	The Hydraulic Cylinder Stroke Length	Please refer to the product specifications for "hydraulic cylinder stroke."
5	The Inlet Hole Position on The Manifold for Hydraulic Fluid Entry	B / S / K / L (In the case of the pipe thread type, leave this section blank.)

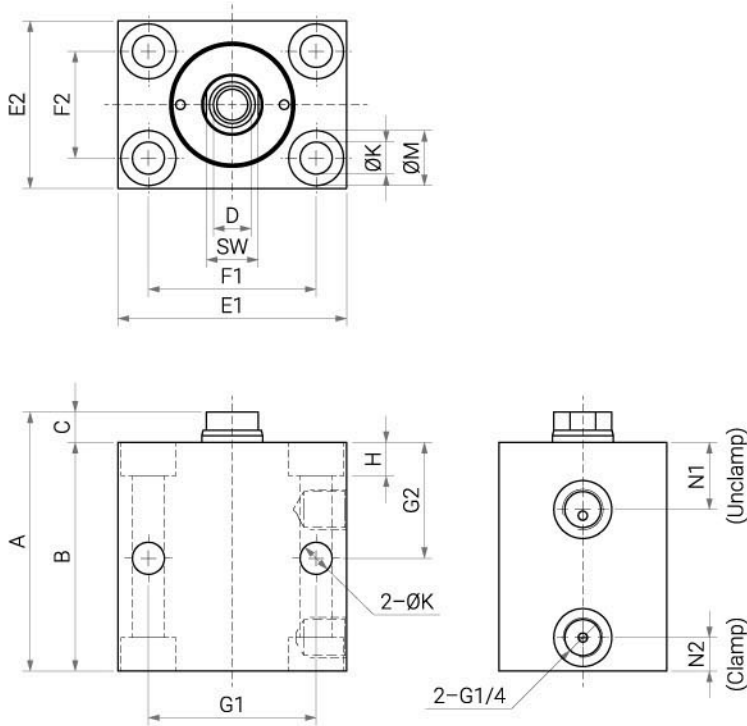
Example:

- A pipe thread hydraulic cylinder with an inner diameter of 25, double-acting, and a stroke of 20, the model number is HBC-25D×20.
- A manifold-mounted hydraulic cylinder with an inner diameter of 16, single-acting, and a stroke of 8, the model number is HBC-16S×8B.

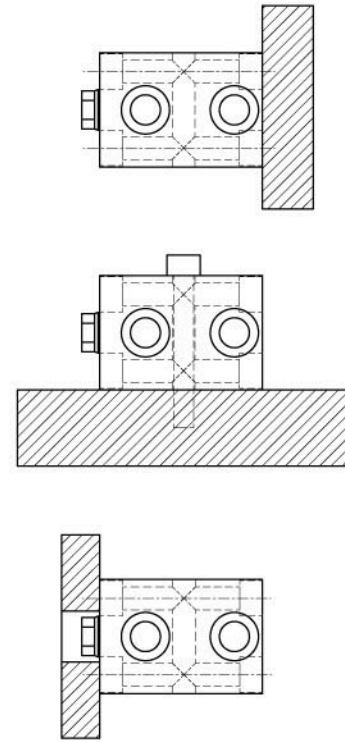
HBC Hydraulic Block Cylinder (Pipe Thread Type)

Piston: $\varnothing 16 \sim \varnothing 40$ mm | Pressure Max: 500 bar

Specifications



Installation Method



HBC – PIPE THREAD TYPE

Items	Unit	Specification							
Piston Diameter	mm	16	25	32	40				
Rod Diameter	mm	10	16	20	25				
Force at 100 bar	kN	2.0	4.9	8.0	12.6				
Force at 500 bar	kN	10.0	24.6	40.2	62.9				
Single-Acting Stroke (Short / Long)	mm	8	20	8	20	10	20	10	20
Double-Acting Stroke (Short / Long)	mm	16	50	20	50	25	50	25	50
A	mm	63	97	71	101	85	110	89	114
B	mm	56	91	64	94	75	100	79	104
C	mm	7	7	10	10				
D (Deep)	mm	M6×1.0 (12)	M10×1.5 (15)	M12×1.75 (15)	M16×2.0 (25)				
SW	mm	8	13	17	N/A				
E1	mm	60	65	75	85				
E2	mm	35	45	55	63				
F1	mm	40	50	55	63				
F2	mm	22	30	35	40				
G1	mm	30	50	55	63				
G2	mm	30	33	38	40				
H	mm	6.5	9	11	11				
K	mm	6.8	9	11	11				
M	mm	11	14	18	18				
N1	mm	18	18	22	24				
N2	mm	11	11	11	11				

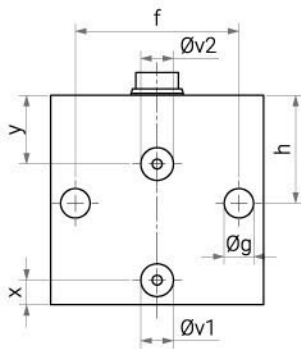
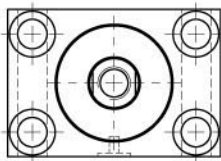
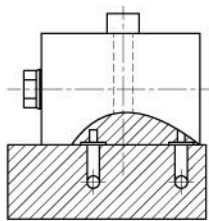
HBC Hydraulic Block Cylinder (Manifold-Mounted Type)

Piston: $\varnothing 16 \sim \varnothing 40$ mm | Pressure Max: 500 bar

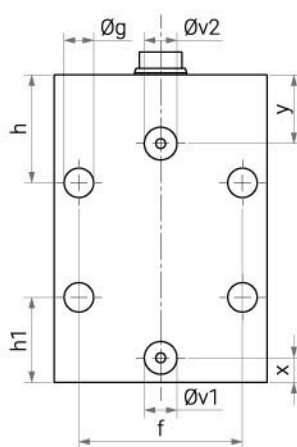
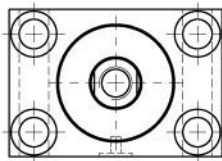
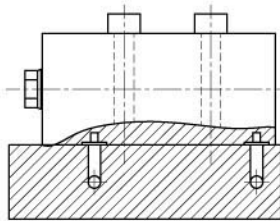
Specifications

- Manifold-Mounted Block Cylinders and Pipe Thread Block Cylinders are identical in terms of appearance, size, and piston stroke. The only difference lies in the inlet hole configuration. The specifications only note the differences in inlet hole positions on the manifold-mounted type.
- There are three options for inlet hole positions: front end (S), back end (B), and side (K or L).

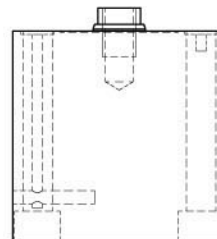
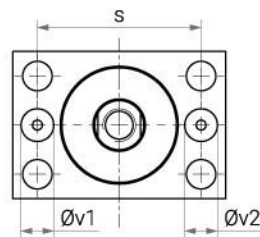
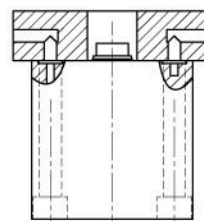
**Side Connection
K Type (Short Stroke)**



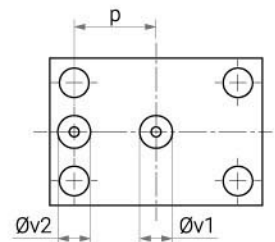
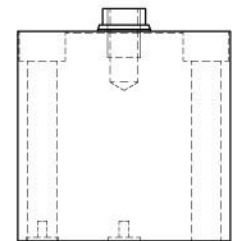
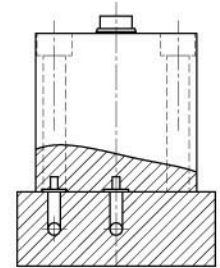
**Side Connection
L Type (Long Stroke)**



**Front Connection
S Type**



**Back Connection
B Type**



Items	HBC-16	HBC-25	HBC-32	HBC-40
f	30	50	55	63
$\varnothing g$	6.5	9	11	11
h	30	33	38	40
h1	24.5	26	27	27
s	40	50	55	65
p	20	25	27.5	31.5
$\varnothing v1$ (Extending)	10	10	10 (K & L) / 13 (B & S)	10 (K & L) / 13 (B & S)
$\varnothing v2$ (Retracting)	10	10	10 (K & L) / 13 (B & S)	10 (K & L) / 13 (B & S)
v1 & v2 Oil Hole	$\varnothing 3$	$\varnothing 3$	$\varnothing 3$	$\varnothing 3$
O-ring	7.5×1.5	7.5×1.5	7.5×1.5 / 10.5×1.5	7.5×1.5 / 10.5×1.5
x	7	7.5	10	10
y	20.5	21	25	27